

SEQUENCE LISTING



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<120> ANTIBODIES DIRECTED TO TUMOR NECROSIS
FACTOR AND USES THEREOF

<130> ABGENIX.073A

<140> 10/727,155
<141> 2003-12-02

<150> 60/430,729
<151> 2002-12-02

<160> 332

<170> FastSEQ for Windows Version 4.0

<210> 1
<211> 384
<212> DNA
<213> Homo sapiens

<400> 1
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cagcacccag ggaaggccct ggagtggatt gggAACATCT attacagtgg gagcacctac 180
tacaacccgt ccctcaagag tcgagttacc atatcaatcg acacgtctaa gaaccaggatc 240
tccctgaagc tgagctctgt gactgccgcg gacacggccg tgtattactg tgcgagagat 300
agtaaccaat ataactggaa cgacgaggatc tacgactacg gtttggacgt ctggggccaa 360
gggaccacgg tcaccgtgtc ctca 384

<210> 2
<211> 128
<212> PRT
<213> Homo sapiens

<400> 2
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1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
35 40 45
Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Asn Pro Ser
50 55 60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
65 70 75 80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
85 90 95
Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu Val Tyr Asp
100 105 110
Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 3
<211> 321
<212> DNA
<213> Homo sapiens

<400> 3
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atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagccct gatctatgct gcatccagtt tgcaaagtgg qgtcccatca 180
aggttcagcg gcagtgatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacaa cataataatt accctctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 4
<211> 107
<212> PRT
<213> Homo sapiens

<400> 4
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Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Asn Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 5

<211> 375
<212> DNA
<213> Homo sapiens

<400> 5
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ccaggcaagg ggctggagtg ggtggcagtt atatggatg atggaagtat taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgtgtat 240
ctacaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagaggag 300
cagctcgta ggggagggtt ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 6
<211> 125
<212> PRT
<213> Homo sapiens

<400> 6
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
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Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
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Asp Ile His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Glu Gln Leu Val Arg Gly Gly Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 7
<211> 321
<212> DNA
<213> Homo sapiens

<400> 7
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gggaaaggccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccgta 180
aggttcagcg gcagtggatc tggccagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttgc caacttatta ctgtctacag cataatagtt acccgctcac tttcgccgga 300
gggaccaagg tggagatcaa a 321

<210> 8
<211> 107
<212> PRT
<213> Homo sapiens

<400> 8

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Ile Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 9

<211> 384

<212> DNA

<213> Homo sapiens

<400> 9

caggtgcagc tgcaggagtc gggcccagga ctggtaagc cttcacagac cctgtccctc 60
acctgcactg tctctgggtgg ctccatcagc agtgggtggtt actactggag ctggatccgc 120
cagcacccag ggaagggcct ggagtggatt gggAACATCTT attacagtgg gagcacctac 180
tacaacccgt ccctcaagag tcgagttacc atatcagtag acacgtctaa gaaccagttc 240
tccctgaagc tgagctctgt gactgcccgcg gacacggccg tgtattactg tgcgagagat 300
agtaaccaat ataactggaa cgacgaggc tacgactacg gttggacgt ctggggccaa 360
gggaccacgg tcaccgtgtc ctca 384

<210> 10

<211> 128

<212> PRT

<213> Homo sapiens

<400> 10

Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
35 40 45
Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Asn Pro Ser
50 55 60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
65 70 75 80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
85 90 95
Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu Val Tyr Asp
100 105 110
Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 11
<211> 321
<212> DNA
<213> Homo sapiens

<400> 11
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atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt accctctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 12
<211> 107
<212> PRT
<213> Homo sapiens

<400> 12
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Arg
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 13
<211> 369
<212> DNA
<213> Homo sapiens

<400> 13
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tcctgtgcag cctctggatt cacctcagt aactatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggatg ggtgacaatt atatcatatg atggaaatgtaa taaataactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgtgtat 240
ctgcaaatga acagcctgag agctgaggac acggctgtgt attactgtgt gacgtattac 300
gatttttggta gtggttatct cccaggtatg gacgtctggg gccaaggac cacggtcacc 360
gtctccatca 369

<210> 14
<211> 123
<212> PRT
<213> Homo sapiens

<400> 14

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Thr Ile Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Val Thr Tyr Tyr Asp Phe Trp Ser Gly Tyr Leu Pro Gly Met Asp Val
 100 105 110
 Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120

<210> 15
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 15
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 atcacttgcc gggcaagtca gggcattaga aatgattaa cctggtatca gcagaaaacca 120
 gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
 aggttcagcg gcagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
 gaagattttg caacttatta ctgtctacag cataatagtt tcccgtggac gttcggccaa 300
 gggaccaagg tggaaatcaa a 321

<210> 16
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 16
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
 20 25 30
 Leu Thr Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
 35 40 45
 Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Phe Pro Trp
 85 90 95
 Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 17
 <211> 351

<212> DNA

<213> Homo sapiens

<400> 17

caggtgcagc tgcaggagtc gggcccagga ctggtaagc cttcgagac cctgtccctc 60
acctgcactg tctctggtgg ctccatcaat cattactact ggagctggat ccggcagccc 120
gccggaaagg gcctgaaatg gattggcgat atctatcca ctgggagcac caactacaac 180
ccctccctca agagtcgagt caccatgtca gtagacacgt ccaagaacca gttctccctg 240
aagctgagct ctgtgaccgc cgccgacacg gccgtatatt actgtgcggg cggctggtcg 300
tactggtact tcgatctctg gggccgtggc accctggtca ctgtctccctc a 351

<210> 18

<211> 117

<212> PRT

<213> Homo sapiens

<400> 18

Gln	Val	Gln	Leu	Gln	Glu	Ser	Gly	Pro	Gly	Leu	Val	Lys	Pro	Ser	Glu
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Thr	Leu	Ser	Leu	Thr	Cys	Thr	Val	Ser	Gly	Gly	Ser	Ile	Asn	His	Tyr
	20						25				30				
Tyr	Trp	Ser	Trp	Ile	Arg	Gln	Pro	Ala	Gly	Lys	Gly	Leu	Glu	Trp	Ile
	35					40				45					
Gly	Arg	Ile	Tyr	Pro	Thr	Gly	Ser	Thr	Asn	Tyr	Asn	Pro	Ser	Leu	Lys
	50					55			60						
Ser	Arg	Val	Thr	Met	Ser	Val	Asp	Thr	Ser	Lys	Asn	Gln	Phe	Ser	Leu
65				70					75			80			
Lys	Leu	Ser	Ser	Val	Thr	Ala	Ala	Asp	Thr	Ala	Val	Tyr	Tyr	Cys	Ala
	85					90				95					
Gly	Gly	Trp	Ser	Tyr	Trp	Tyr	Phe	Asp	Leu	Trp	Gly	Arg	Gly	Thr	Leu
	100					105				110					
Val	Thr	Val	Ser	Ser											
	115														

<210> 19

<211> 342

<212> DNA

<213> Homo sapiens

<400> 19

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atctcctgca ggtctagtca aagcctcgta tacagtgtatc gaagcaccta cttgaattgg 120
tttcagcaga ggccaggcca atctccaagg cgcctaattt ataaggtttc taactggac 180
tctgggtcc cagacagatt cagcggcagt gggtcaggca ctgatttcac actgaaaatc 240
agcagggtgg aggctgaaga tgggggtt tattactgca tgcaagggttc acactggcct 300
cgggagttca cttcggcgg agggaccaag gtggagatca aa 342

<210> 20

<211> 114

<212> PRT

<213> Homo sapiens

<400> 20

Asp Val Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Leu Gly

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Gln	Pro	Ala	Ser	Ile	Ser	Cys	Arg	Ser	Ser	Gln	Ser	Leu	Val	Tyr	Ser
20	25	30													
Asp	Gly	Ser	Thr	Tyr	Leu	Asn	Trp	Phe	Gln	Gln	Arg	Pro	Gly	Gln	Ser
35	40	45													
Pro	Arg	Arg	Leu	Ile	Tyr	Lys	Val	Ser	Asn	Trp	Asp	Ser	Gly	Val	Pro
50	55	60													
Asp	Arg	Phe	Ser	Gly	Ser	Gly	Ser	Gly	Thr	Asp	Phe	Thr	Leu	Lys	Ile
65	70	75	80												
Ser	Arg	Val	Glu	Ala	Glu	Asp	Val	Gly	Val	Tyr	Tyr	Cys	Met	Gln	Gly
85	90	95													
Ser	His	Trp	Pro	Arg	Glu	Phe	Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu
100	105	110													
Ile Lys															

<210> 21
<211> 369
<212> DNA
<213> Homo sapiens

<400> 21
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tcctgtgcag cgtctggatt caccttcagt aactatgaca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaagtat taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgcat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagata 300
gcagtggctg gaggttacta ctacggtttg gacgtctggg gccaaggac cacggtcacc 360
gtctcctca 369

<210> 22
<211> 123
<212> PRT
<213> Homo sapiens

<400> 22
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu His
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Ile Ala Val Ala Gly Gly Tyr Tyr Tyr Gly Leu Asp Val
100 105 110
Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 23
<211> 321
<212> DNA
<213> Homo sapiens

<400> 23
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atcaacttgcgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcgc gcagtggtac tgggacagaa ttcactctca cagtcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag catcatagtt acccgctcac tttcggcgga 300
gggaccaagg tacagatcaa t 321

<210> 24
<211> 107
<212> PRT
<213> Homo sapiens

<400> 24
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Val Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His His Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Gln Ile Asn
100 105

<210> 25
<211> 384
<212> DNA
<213> Homo sapiens

<400> 25
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acctgcactg tctctggtgg ctccatcagc agtgggtgtt actactggag ctggatccgc 120
cagcacccag ggaaggccct ggagtggatt gggacatct attacagtgg gagcacctac 180
tacaccccgat ccctcaagag tcgagttacc atatcagtag acacgtctaa gaaccagtgc 240
tccctgaagc tgagctctgt gactgcccgc gacacggccg tgtattactg tgcgagagat 300
agtaaccaat ataactggaa cgacgaggtc tacgactacg gtttggacgt ctggggccaa 360
gggaccacgg tcaccgtgtc ctca 384

<210> 26
<211> 128
<212> PRT
<213> Homo sapiens

<400> 26

Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
 1 5 10 15
 Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
 20 25 30
 Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
 35 40 45
 Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Thr Pro Ser
 50 55 60
 Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
 65 70 75 80
 Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
 85 90 95
 Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu Val Tyr Asp
 100 105 110
 Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120 125

<210> 27
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 27
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 atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
 gggaaagccc ctaagcgccct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
 aggttcagcgc gcaagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
 gaagattttg caacttatta ctgtctacag cataataatt accctctcac tttcggcgga 300
 gggaccaagg tggagatcaa a 321

<210> 28
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 28
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
 35 40 45
 Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Asn Tyr Pro Leu
 85 90 95
 Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 29
 <211> 384

<212> DNA
<213> Homo sapiens

<400> 29

caggtgcagc tgcaggagtc gggcccagga ctggtgaagc cttcacagac cctgtccctc 60
acctgcactg tctctggtgg ctccatcagc agtgggtggtt actactggag ctggatccgc 120
cagcacccag ggaagggcct ggagtggatt gggAACATCT attacagtgg gagcacctac 180
tacaacccgt ccctcaagag tcgagttacc atatcagtag acacgtctaa gaaccagttc 240
tccctgaagc tgagctctgt gactgccgcg gacacggccg tgtattactg tgcgagagat 300
agtaaccagt ataactggaa cgacgaggc tacgactacg gtttggacgt ctggggccaa 360
gggaccacgg tcaccgtctc ctca 384

<210> 30

<211> 128

<212> PRT

<213> Homo sapiens

<400> 30

Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
35 40 45
Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Asn Pro Ser
50 55 60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
65 70 75 80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
85 90 95
Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu Val Tyr Asp
100 105 110
Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 31

<211> 321

<212> DNA

<213> Homo sapiens

<400> 31

gacatccaaa tgacccagtc tccatccgcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtcttcag cataaaagtt accctctcac tttcggcgaa 300
gggaccaagg tggagatcaa a 321

<210> 32

<211> 107

<212> PRT

<213> Homo sapiens

<400> 32

Asp Ile Gln Met Thr Gln Ser Pro Ser Ala Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
 35 40 45
 Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Lys Ser Tyr Pro Leu
 85 90 95
 Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 33
 <211> 366
 <212> DNA
 <213> Homo sapiens

<400> 33
 caggtgcagc tgggtggagtc tgggggaggt gtgggtccagc ctggggaggc cctgagactc 60
 tcctgtgcag cctctggatt caccttcagt agctatggca tgcactgggt ccggccaggct 120
 ccaggcaagg ggctggagtg ggtggcagtt atatcatatg atggaagtaa taaatactat 180
 gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaaatga acagcctgag agctgaggac acggctgtgt attactgtgc gagagatcag 300
 gataactgga actactacta cggtatggac gtctgggccc aagggaccac ggtcaccgtc 360
 tcctca 366

<210> 34
 <211> 122
 <212> PRT
 <213> Homo sapiens

<400> 34
 Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Asp Gln Asp Asn Trp Asn Tyr Tyr Tyr Gly Met Asp Val Trp
 100 105 110
 Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120

<210> 35

<211> 333
<212> DNA
<213> Homo sapiens

<400> 35
gatattgtga tgactcagtc tccactctcc ctgcccgtca cccctggaga gccggcctcc 60
atctcctgca ggtctagtca gagcctcctt catagtaatg gataacaacta tttggattgg 120
tacctgcaga agccagggca gtctccacag ctcctgatct ttttgggttc ttatcggcc 180
tccggggtcc ctgacaggtt cagtggcagt ggatcaggca cagattttac actgaaaatc 240
agoagagtgg aggctgagga ttttgggtt tattactgca tgcaagctct acaaacttgg 300
acgatcgcc aaggaccaa ggtggaaatc aaa 333

<210> 36
<211> 111
<212> PRT
<213> Homo sapiens

<400> 36
Asp Ile Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Pro Gly
1 5 10 15
Glu Pro Ala Ser Ile Ser Cys Arg Ser Ser Gln Ser Leu Leu His Ser
20 25 30
Asn Gly Tyr Asn Tyr Leu Asp Trp Tyr Leu Gln Lys Pro Gly Gln Ser
35 40 45
Pro Gln Leu Leu Ile Phe Leu Gly Ser Tyr Arg Ala Ser Gly Val Pro
50 55 60
Asp Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Phe Thr Leu Lys Ile
65 70 75 80
Ser Arg Val Glu Ala Glu Asp Val Gly Val Tyr Tyr Cys Met Gln Ala
85 90 95
Leu Gln Thr Trp Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105 110

<210> 37
<211> 372
<212> DNA
<213> Homo sapiens

<400> 37
caggtgcagc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacccatgt aactatgaca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatg atggaaagtat taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgaaatga acaggcctgag agccgaggac acggctgtgt atttctgtgc gagagagaca 300
gctatccta ggggtacta ctactacgt atggacgtct ggggccaagg gaccacggc 360
accgtctcctt ca 372

<210> 38
<211> 124
<212> PRT
<213> Homo sapiens

<400> 38
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg

1	5	10	15												
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Asn	Tyr
20								25						30	
Asp	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
35								40				45			
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Ile	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
50								55				60			
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
65								70			75			80	
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Phe	Cys
								85			90			95	
Ala	Arg	Glu	Thr	Ala	Ile	Leu	Arg	Gly	Tyr	Tyr	Tyr	Tyr	Asp	Met	Asp
					100			105						110	
Val	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser				
					115			120							

<210> 39

<211> 321

<212> DNA

<213> Homo sapiens

<400> 39

gacatccaga	tgacccagtc	tccatcctcc	ctgtctgcat	ctgttaggaga	cagagtcacc	60
atcaacttgcc	gggcaagtca	gggcattaga	aatgatttag	gctggtatca	gcagaaacca	120
gggaaagccc	ctaagcgcct	gatctctgct	gcatccagtt	tgcaaggtgg	ggtcccatca	180
aggttcagcgc	gcagtggatc	tggacagaa	ttcactctca	caatcagcag	cctgcagcct	240
gaagattttg	caacttatta	ctgtctacag	cataatagtt	accctctcac	tttcggcgga	300
gggaccaagg	tggagatcaa	a				321

<210> 40

<211> 107

<212> PRT

<213> Homo sapiens

<400> 40

Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Ser	Leu	Ser	Ala	Ser	Val	Gly
1			5				10						15		
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Gly	Ile	Arg	Asn	Asp
							20				25		30		
Leu	Gly	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Arg	Leu	Ile
							35				40		45		
Ser	Ala	Ala	Ser	Ser	Leu	Gln	Gly	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
							50				55		60		
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro
							65				70		75		80
Glu	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Leu	Gln	His	Asn	Ser	Tyr	Pro	Leu
							85				90		95		
Thr	Phe	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys						
							100				105				

<210> 41

<211> 372

<212> DNA

<213> Homo sapiens

<400> 41

caggtgcagt tgggggagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtcag cctctggatt cacccatcgtt agctatgaca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatcatatg atgaaagtat taaatactat 180
gcagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaagtga acagcctgag agctgaggac acggctgtgtt attactgtgc gagagaggc 300
cgttagtgggaa gctactacta ttactacagt atggacgtct ggggccaagg gaccacggc 360
accgtctcct ca 372

<210> 42

<211> 124

<212> PRT

<213> Homo sapiens

<400> 42

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg
1															15
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Ser	Tyr
															30
Asp	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
															45
Ala	Val	Ile	Ser	Tyr	Asp	Gly	Ser	Ile	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
															50
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
															65
Leu	Gln	Val	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
															85
Ala	Arg	Glu	Val	Arg	Ser	Gly	Ser	Tyr	Tyr	Tyr	Tyr	Ser	Met	Asp	
															100
Val	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser				
															115
															120

<210> 43

<211> 321

<212> DNA

<213> Homo sapiens

<400> 43

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcaacttgcc gggcaagtca ggacatcaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagcgctt gatctatgct gcgtccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtatc tgggccagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttgc caacttatta ctgtctacaa cataatagtt atccgctcac ttccggcgg 300
gggaccaagg tggagatcaa a 321

<210> 44

<211> 107

<212> PRT

<213> Homo sapiens

<400> 44

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly

1	5	10	15												
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Asp	Ile	Arg	Asn	Asp
20	25	30													
Leu	Gly	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Arg	Leu	Ile
35	40	45													
Tyr	Ala	Ala	Ser	Ser	Leu	Gln	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
50	55	60													
Ser	Gly	Ser	Gly	Pro	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro
65	70	75	80												
Glu	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Leu	Gln	His	Asn	Ser	Tyr	Pro	Leu
85	90	95													
Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys					
100	105														

<210> 45
 <211> 345
 <212> DNA
 <213> Homo sapiens

<400> 45
 gaggtgcagc tggaggagtc tggaggaggg ttgatccagc ctggggggtc cctgagactc 60
 tcctgtgcag cctctgggtt caccgtcagt agcaactaca tgagctgggt ccggcaggct 120
 ccagggagg ggctgaaatg ggtctcagtt atttatacggt gtgataggac atactacgca 180
 gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
 caaatgaaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgcg aggggagggg 300
 ggatttgact actggggcca gggAACCTG gtcaccgtct cctca 345

<210> 46
 <211> 115
 <212> PRT
 <213> Homo sapiens

<400> 46
 Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
 20 25 30
 Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ser Val Ile Tyr Ser Gly Asp Arg Thr Tyr Tyr Ala Asp Ser Val Lys
 50 55 60
 Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
 65 70 75 80
 Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
 85 90 95
 Arg Gly Glu Gly Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
 100 105 110
 Val Ser Ser
 115

<210> 47
 <211> 318
 <212> DNA

<213> Homo sapiens

<400> 47

gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagccacc 60
ctctcctgca gggccagtca gagtgttacc agcaacttag cctggtagcca gcagaaacct 120
ggccaggctc ccagactcct catccatggt gcatccatta gggccactgg tctcccagcc 180
aggttcagtg gcagtgggtc tgggacagag ttcactctca ccatcagtag cctgcagtct 240
gaagattttg cagtctatta ctgtcagcag tataattatt ggtggacgtt cggccaaggg 300
accaagggtgg aaatcaaa 318

<210> 48

<211> 106

<212> PRT

<213> Homo sapiens

<400> 48

Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Thr Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
His Gly Ala Ser Ile Arg Ala Thr Gly Leu Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Tyr Trp Trp Thr
85 90 95
Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 49

<211> 345

<212> DNA

<213> Homo sapiens

<400> 49

gaggtgcagc tggggggggc ttgatccagc ctggggggc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt aggaactaca tgagctgggt ccggcaggct 120
ccagggaaagg ggctggaatg ggtctcagtt atttatacgcg gtgataggac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagagc cgaggacacg gccgtgttatt actgtgcgcg aggggagggg 300
ggatttgact actggggcca gggaaacctg gtcaccgtct cctca 345

<210> 50

<211> 115

<212> PRT

<213> Homo sapiens

<400> 50

Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Arg Asn
20 25 30

Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Asp Arg Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Glu Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
100 105 110
Val Ser Ser
115

<210> 51
<211> 318
<212> DNA
<213> Homo sapiens

<400> 51
gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagccacc 60
ctctcctgca gggccagtc gagggttagc agcaacttag cctggtagca gcagaaaacct 120
ggccaggctc ccagactcct catccatggt gcatccatta gggccactgg tctccagcc 180
aggttcagtg gcagtgggtc tggacagag ttcactctca ccatcagtag cctccagtc 240
gaagattttg cagtctatta ctgtcagcag tataattatt ggtggacgtt cggccaagg 300
accaaggtgg aaatcaaa 318

<210> 52
<211> 106
<212> PRT
<213> Homo sapiens

<400> 52
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
His Gly Ala Ser Ile Arg Ala Thr Gly Leu Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Tyr Trp Trp Thr
85 90 95
Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 53
<211> 345
<212> DNA
<213> Homo sapiens

<400> 53

gaggtgcagc tggggggc ttgatccagc ctggggggc cctgagactc 60
tcctgtgcag cctctgagtt caccgtcagt aggaactaca tgagctgggt ccgcaggct 120
ccaggaaagg gactggaaatg ggtctcagtt atttatacgat gtgataggac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgcg aggggagggg 300
ggatttact actggggcca gggaaaccctg gtcaccgtct cctca 345

<210> 54
<211> 115
<212> PRT
<213> Homo sapiens

<400> 54
Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Glu Phe Thr Val Ser Arg Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Asp Arg Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Glu Gly Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
100 105 110
Val Ser Ser
115

<210> 55
<211> 318
<212> DNA
<213> Homo sapiens

<400> 55
gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccaggaga aagagccacc 60
cttcctgca gggccagtca gaggtttagc agcaacttag cctggtagca gcagaaacct 120
ggccaggctc ccagactcct catccatggt gcatccatta gggccactgg tctcccagcc 180
aggttcagtg gcagtgggtc tgggacagag ttcaactctca ccatcagtag cctgcagtt 240
gaagattttg cagtcttata ctgtcagcag tataattttt ggtggacgtt cggccaagggg 300
accaagggtgg aaatcaaa 318

<210> 56
<211> 106
<212> PRT
<213> Homo sapiens

<400> 56
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile

35	40	45
His Gly Ala Ser Ile Arg Ala Thr Gly Leu Pro Ala Arg Phe Ser Gly		
50	55	60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser		
65	70	75
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Tyr Trp Trp Thr		
85	90	95
Phe Gly Gln Gly Thr Lys Val Glu Ile Lys		
100	105	

<210> 57
<211> 375
<212> DNA
<213> *Homo sapiens*

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<400> 57
caggtgcaac tggtgagtc tgggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtcag cgtctggatt acccgtagt agctatggca tgcactgggt ccgccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtcta atggaagtaa taagtactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acacgcctgag agccgaggac acggctgtgt attactgtgc gagagataac 300
ggtgtctacg tggatacgc ctactattac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375
```

<210> 58
<211> 125
<212> PRT
<213> *Homo sapiens*

```
<210> 59
<211> 321
<212> DNA
<213> Homo sapiens
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<400> 59

gacatccaga tgaccaggc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaattgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgccct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt accctcgac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 60
<211> 107
<212> PRT
<213> Homo sapiens

<400> 60
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Arg
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 61
<211> 375
<212> DNA
<213> Homo sapiens

<400> 61
cagtgcaac tggtgaggc tggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccgtcagt agctatggc tgcactgggt ccgcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtcta atggaaagtaa taagtactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgtgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagataac 300
ggtgtctacg tggatacgc ctactattac ggtatggacg tctggccca agggaccacg 360
gtcaccgtct cctca 375

<210> 62
<211> 125
<212> PRT
<213> Homo sapiens

<400> 62
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45

Ala Val Ile Trp Ser Asn Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Asp Asn Gly Val Tyr Val Gly Tyr Ala Tyr Tyr Gly Met
 100 105 110
 Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120 125

<210> 63
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 63
 gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
 atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcaaaaacca 120
 gggaaagccc ctaagccct gatctatgct gcatccagtt tgcacagtgg ggtcccatca 180
 aggttcagcg gcagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
 gaagattttg caacttatta ctgtctacaa cataatagtt acccgtggac gttcggccaa 300
 gggaccaagg tggaaatcaa a 321

<210> 64
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 64
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
 35 40 45
 Tyr Ala Ala Ser Ser Leu His Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp
 85 90 95
 Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 65
 <211> 384
 <212> DNA
 <213> Homo sapiens

<400> 65
 caggtgcagc tggtgaggc tggggaaagc gtggccagc ctgggaggc cctgagactc 60
 tcctgtgcag cgtctggatt cacttcagt aactatggca tacactgggt ccgcaggct 120

ccaggcaagg ggctggagtg ggtggcagtt atatggtctg atggaagtaa taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagctc 300
ccgaatagtg ggagctactc cggttactac tactactacg gtatggacgt ctggggccaa 360
gggaccacgg tcaccgtctc ctca 384

<210> 66
<211> 128
<212> PRT
<213> Homo sapiens

<400> 66
Gln Val Gln Leu Val Glu Ser Gly Gly Ser Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Ile His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Ser Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Leu Pro Asn Ser Gly Ser Tyr Ser Gly Tyr Tyr Tyr Tyr
100 105 110
Tyr Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 67
<211> 321
<212> DNA
<213> Homo sapiens

<400> 67
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcaacttgcgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
ggaaaagccc ctaagccct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
agtttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cattgttgtt accctctcac tttcggcgga 300
gggaccaagg tggaaatcaa a 321

<210> 68
<211> 107
<212> PRT
<213> Homo sapiens

<400> 68
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45

Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Cys Cys Tyr Pro Leu
 85 90 95
 Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 69
 <211> 375
 <212> DNA
 <213> Homo sapiens

<400> 69
 caggtgcagc tgggtggagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
 tcctgtgcag cgtctggatt caccttcagt agctatgaca tgcactgggt ccgcaggct 120
 ccaggcaagg ggctggagtg ggtggcagtt atatggctg atggaagtat taaatactat 180
 gcagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagaagtg 300
 gaatcagcta tgggagggtt ctactacaac ggtatggacg tctggggcca aggggccacg 360
 gtcaccgtct cctca 375

<210> 70
 <211> 125
 <212> PRT
 <213> Homo sapiens

<400> 70
 Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp Ser Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Glu Val Glu Ser Ala Met Gly Gly Phe Tyr Tyr Asn Gly Met
 100 105 110
 Asp Val Trp Gly Gln Gly Ala Thr Val Thr Val Ser Ser
 115 120 125

<210> 71
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 71
 gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttagggga cagagtcacc 60

atcacttgcc gggcaagtca gggcattaga attgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccactt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc ggggacagaa ttcatatca caatcagcag cctgcagcct 240
gaagatttg caagttatta ctgtctacag cataaaagtt accctctcac tttcggcgg 300
gggaccaagg tggagatcaa a 321

<210> 72
<211> 107
<212> PRT
<213> Homo sapiens

<400> 72
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Ile Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Thr Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Ile Phe Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Ser Tyr Tyr Cys Leu Gln His Lys Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 73
<211> 375
<212> DNA
<213> Homo sapiens

<400> 73
caggtgcagc tggggagtc tggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacttcagt agctatgaca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggatg ggtggcagtt atatggctg atggaaagtat taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagaagtg 300
gaatcagcta tgggggggtt ctactacaac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 74
<211> 125
<212> PRT
<213> Homo sapiens

<400> 74
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Ser Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val

50	55	60													
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
65															80
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
															85
Ala	Arg	Glu	Val	Glu	Ser	Ala	Met	Gly	Gly	Phe	Tyr	Tyr	Asn	Gly	Met
															100
Asp	Val	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser			105
															110
															115
															120
															125

<210> 75
 <211> 375
 <212> DNA
 <213> Homo sapiens

<400> 75
 caggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggtc cctgagactc 60
 tcctgtgcag cgtctggatt caccttcagt aaccatgaca tacactgggt ccggccaggct 120
 ccaggcaagg ggctggagtg ggtggcagtt atatggtctg atggaagtaa taaatactat 180
 gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
 atggctacaa ttaaggggta ctactactac ggtatggacg tctggggcca agggaccacg 360
 gtcaccgtct cctca 375

<210> 76
 <211> 125
 <212> PRT
 <213> Homo sapiens

<400> 76
 Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn His
 20 25 30
 Asp Ile His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp Ser Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Glu Lys Met Ala Thr Ile Lys Gly Tyr Tyr Tyr Gly Met
 100 105 110
 Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120 125

<210> 77
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 77

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgct gatctatgct gcatccagtt tggaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggccagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcca a 321

<210> 78
<211> 107
<212> PRT
<213> Homo sapiens

<400> 78
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Glu Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Gln
100 105

<210> 79
<211> 336
<212> DNA
<213> Oryctolagus cuniculus

<400> 79
cagtcactgg aggagtccgg gggtcgcctg gtcacgcctg ggacacccct gacactcacc 60
tgcacagtct ctggaatcga cctcagtagc aatacaatgg gctggttccg ccgggctcca 120
gggaaggggc tggagtggat cggaatcatt attagtagtg gtaccacata ctacgcgagc 180
tggtaaaag gccgattcac catctccaaa acctcgacca cggtggatct gaaaatcacc 240
cgtccgacaa ccgaggacac ggcacatat ttctgtgcca gaggctggta cgagtttaac 300
ttgtgggccc caggcacccct ggtcaccgtc tcctca 336

<210> 80
<211> 112
<212> PRT
<213> Oryctolagus cuniculus

<400> 80
Gln Ser Leu Glu Glu Ser Gly Gly Arg Leu Val Thr Pro Gly Thr Pro
1 5 10 15
Leu Thr Leu Thr Cys Thr Val Ser Gly Ile Asp Leu Ser Ser Asn Thr
20 25 30
Met Gly Trp Phe Arg Arg Ala Pro Gly Lys Gly Leu Glu Trp Ile Gly
35 40 45
Ile Ile Ile Ser Ser Gly Thr Thr Tyr Tyr Ala Ser Trp Val Lys Gly

50	55	60	
Arg Phe Thr Ile Ser Lys Thr Ser Thr Thr Val Asp Leu Lys Ile Thr			
65	70	75	80
Arg Pro Thr Thr Glu Asp Thr Ala Thr Tyr Phe Cys Ala Arg Gly Trp			
85	90	95	
Tyr Glu Phe Asn Leu Trp Gly Pro Gly Thr Leu Val Thr Val Ser Ser			
100	105	110	

<210> 81
 <211> 339
 <212> DNA
 <213> Oryctolagus cuniculus

<400> 81
 gatgttgtga tgacccagac tccagcctcc gtggaggcag ctgtggagg cacagtcacc 60
 atcaagtgcc aggcagtga gaacattgtatcttattgg cctggtatca gcagaaaagta 120
 gggcagcctc ccaagctcct gatctatagg gcatccaaac tggcctctgg ggcccatcg 180
 cgggttcagcg gcagtggatc tgggacagag ttcactctca ccatcagcga cctggagtgt 240
 ggcgatgctg ccacttacta ctgtcaaagc aatgttgta gtactgctag aagtagttat 300
 ggtaatgctt tcggcggagg gaccgaggtg gtggtaaaa 339

<210> 82
 <211> 113
 <212> PRT
 <213> Oryctolagus cuniculus

<400> 82
 Asp Val Val Met Thr Gln Thr Pro Ala Ser Val Glu Ala Ala Val Gly
 1 5 10 15
 Gly Thr Val Thr Ile Lys Cys Gln Ala Ser Glu Asn Ile Asp Ile Leu
 20 25 30
 Leu Ala Trp Tyr Gln Gln Lys Val Gly Gln Pro Pro Lys Leu Leu Ile
 35 40 45
 Tyr Arg Ala Ser Lys Leu Ala Ser Gly Ala Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Asp Leu Glu Cys
 65 70 75 80
 Gly Asp Ala Ala Thr Tyr Tyr Cys Gln Ser Asn Val Gly Ser Thr Ala
 85 90 95
 Arg Ser Ser Tyr Gly Asn Ala Phe Gly Gly Thr Glu Val Val Val
 100 105 110
 Lys

<210> 83
 <211> 348
 <212> DNA
 <213> Homo sapiens

<400> 83
 caggtgcagc tgggtggagtc tgggggaggc ttggtaaagc ctggagggtc cctgagactc 60
 tcctgtgcag cctctggatt caccttcagt gactactaca tgagctggat ccgccaggct 120
 ccagggaaagg ggctggagtg ggttcatac attagtagaa gtggtagtac cataactac 180

gcagactctg tgaaggccg attcaccatc tccagggaca acgccaagaa ctcactgtat 240
ctgcaaatga acagcctgag agccgaggac acggccgtgt attactgtgc gagatctta 300
ggcggtatgg acgtctgggg ccaagggacc acggtcaccg ttcctca 348

<210> 84
<211> 116
<212> PRT
<213> Homo sapiens

<400> 84
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr
20 25 30
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Arg Ser Gly Ser Thr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Ser Leu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val
100 105 110
Thr Val Ser Ser
115

<210> 85
<211> 330
<212> DNA
<213> Homo sapiens

<400> 85
cagtctgtgt tgacgcagcc gccctcagtg tctgcggccc caggacagaa ggtcaccatc 60
tcctgctctg gaagcagctc caacattggg aataattatg tattctggta ccagcagttc 120
ccaggaacag ccccaaact cctcatttat gacaataata gccgaccctc agggattcct 180
gaccgattct ctggctccaa gtctggcacg tcagccaccc tgggcatcac cggactccag 240
actggggacg aggccgatta ttactgcgga acatggata gcagcctgag tgctgggtg 300
ttcggcggag ggaccaagct gaccgtccta 330

<210> 86
<211> 110
<212> PRT
<213> Homo sapiens

<400> 86
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Asn Asn
20 25 30
Tyr Val Ser Trp Tyr Gln Gln Phe Pro Gly Thr Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Asp Asn Asn Ser Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser
50 55 60

Gly Ser Lys Ser Gly Thr Ser Ala Thr Leu Gly Ile Thr Gly Leu Gln
 65 70 75 80
 Thr Gly Asp Glu Ala Asp Tyr Tyr Cys Gly Thr Trp Asp Ser Ser Leu
 85 90 95
 Ser Ala Gly Val Phe Gly Gly Thr Lys Leu Thr Val Leu
 100 105 110

<210> 87
 <211> 354
 <212> DNA
 <213> Homo sapiens

<400> 87
 caggtgcagc tgggggagac gtggccagc ctgggaggc cctgagactc 60
 tcctgtcag cgtctggatt cacctcagt agctctggca tgcactgggt ccggccaggct 120
 ccaggcaagg ggctggagtg ggtggcaatt atatggtatg atggaagtaa taaatactat 180
 gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagatgac 300
 tactactacg gtatggacgt ctggggccaa gggaccacgg tcaccgtctc ctca 354

<210> 88
 <211> 118
 <212> PRT
 <213> Homo sapiens

<400> 88
 Gln Val Gln Leu Val Glu Ser Gly Gly Asp Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Ser
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Ile Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Asp Asp Tyr Tyr Gly Met Asp Val Trp Gly Gln Gly Thr
 100 105 110
 Thr Val Thr Val Ser Ser
 115

<210> 89
 <211> 330
 <212> DNA
 <213> Homo sapiens

<400> 89
 cagtcgtgcgt tgacgcagcc gcctcagtgtctgcggccc caggacagaa ggtcaccatc 60
 tcctgctctg gaagcagctc caacattggg agtaattatg tatcctgggt ccagcagctc 120
 ccaagaacag ccccaaact cctcatttat gacaataata agcgaccctc agggattcct 180
 gaccgattct ctggctccaa gtctggcacg tcagccaccc tggtcatcac cgactccag 240

actggggacg aggccgatta ttactgcgga gcatggata gcagcctgag tgctgggta 300
ttcggcggag ggaccaagct gaccgtccta 330

<210> 90
<211> 110
<212> PRT
<213> Homo sapiens

<400> 90
Gln Ser Ala Leu Thr Gln Pro Pro Ser Val Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Asn Ile Gly Ser Asn
20 25 30
Tyr Val Ser Trp Cys Gln Gln Leu Pro Arg Thr Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Asp Asn Asn Lys Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser
50 55 60
Gly Ser Lys Ser Gly Thr Ser Ala Thr Leu Val Ile Thr Gly Leu Gln
65 70 75 80
Thr Gly Asp Glu Ala Asp Tyr Tyr Cys Gly Ala Trp Asp Ser Ser Leu
85 90 95
Ser Ala Gly Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 91
<211> 363
<212> DNA
<213> Homo sapiens

<400> 91
caggtgcagc tggtgagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatg atggaaataa taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctatat 240
ctgcaaataatga acagcctgag accgaggac acggctgtgt attactgtgc gagagagac 300
gactacggtg gtaaccctta cttgactac tggggccaag ggaccctggt caccgtctcc 360
tca 363

<210> 92
<211> 121
<212> PRT
<213> Homo sapiens

<400> 92
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Asn Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80

Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Glu Ser Asp Tyr Gly Gly Asn Pro Tyr Phe Asp Tyr Trp Gly
 100 105 110
 Gln Gly Thr Leu Val Thr Val Ser Ser
 115 120

<210> 93
 <211> 324
 <212> DNA
 <213> Homo sapiens

<400> 93
 tctctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
 acatgccaag gagacagcct cagaagctat tatgcaagct ggtaccagca gaggccagga 120
 caggccccctg tacttgtcat ctatggtaga aacaaccggc cctcaggat cccagaccga 180
 ttctctggct ccagctcagg actcacagct tccttgaccg tcactggggc tcaggcggaa 240
 gatgaggctg actattactg taactcccg gacagcagtt ataaccatgt ggcattcggc 300
 ggagggacca agctgaccgt ccta 324

<210> 94
 <211> 108
 <212> PRT
 <213> Homo sapiens

<400> 94
 Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
 1 5 10 15
 Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
 20 25 30
 Ser Trp Tyr Gln Gln Arg Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
 35 40 45
 Gly Arg Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
 50 55 60
 Ser Ser Gly Leu Thr Ala Ser Leu Thr Val Thr Gly Ala Gln Ala Glu
 65 70 75 80
 Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Tyr Asn His
 85 90 95
 Val Ala Phe Gly Gly Thr Lys Leu Thr Val Leu
 100 105

<210> 95
 <211> 363
 <212> DNA
 <213> Homo sapiens

<400> 95
 caggtgcagc tggtgagtc tggggaggc gtggccagc ctgggaggc cctgagactc 60
 tcctgtgcag cgtctggatt caccttca gactatggca tgaactgggt ccgccaggct 120
 ccaggcaagg ggctggatg ggtggcagtt atatggatg atggaagtaa taaatactat 180
 ggagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 gtgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagagc 300
 gactacggtg gtaaccctta ctttgactac tggggccagg gaaccctggc caccgtctcc 360

<210> 96
<211> 121
<212> PRT
<213> Homo sapiens

<400> 96
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Gly Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Val Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Ser Asp Tyr Gly Gly Asn Pro Tyr Phe Asp Tyr Trp Gly
100 105 110
Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 97
<211> 324
<212> DNA
<213> Homo sapiens

<400> 97
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaatctat tatgcaagct ggtaccagca gaagccagga 120
cagggccctg tacttgtcat ctatggtaaa aacaaccggc cctcaggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgaccg tcactggggc tcaggcggaa 240
gatgaggctg actattactg taagtcccg gacagcagtt ttaaccatgt gacattcggc 300
ggagggacca agctgaccgt ccta 324

<210> 98
<211> 108
<212> PRT
<213> Homo sapiens

<400> 98
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ile Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Val Thr Gly Ala Gln Ala Glu
65 70 75 80

Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Phe Asn His
85 90 95
Val Thr Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 99
<211> 348
<212> DNA
<213> Homo sapiens

<400> 99
gaggtgcagc tggcgcagtc tggagcagag gtgaaaaagc cccgggagtc tctgaagatc 60
tcctgttaagg gttctggata cagcttacc agtgactgga tcggctgggt gcccagatg 120
cccgaaag gcctggatg gatggggatc atctatcctg gtgactctga taccagatac 180
agcccgtcct tccaaggcca ggtcaccatc tcagccgaca agtccatcac caccgcctac 240
ctgcagtgga gcagcctgaa ggctcggac accgccatgt attactgtgc gaggagtgg 300
tacggatgg acgtctgggg ccaagggacc acggtcaccg ttcctca 348

<210> 100
<211> 116
<212> PRT
<213> Homo sapiens

<400> 100
Glu Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Glu
1 5 10 15
Ser Leu Lys Ile Ser Cys Lys Gly Ser Gly Tyr Ser Phe Thr Ser Asp
20 25 30
Trp Ile Gly Trp Val Arg Gln Met Pro Gly Lys Gly Leu Glu Trp Met
35 40 45
Gly Ile Ile Tyr Pro Gly Asp Ser Asp Thr Arg Tyr Ser Pro Ser Phe
50 55 60
Gln Gly Gln Val Thr Ile Ser Ala Asp Lys Ser Ile Thr Thr Ala Tyr
65 70 75 80
Leu Gln Trp Ser Ser Leu Lys Ala Ser Asp Thr Ala Met Tyr Tyr Cys
85 90 95
Ala Arg Ser Gly Tyr Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val
100 105 110
Thr Val Ser Ser
115

<210> 101
<211> 334
<212> DNA
<213> Homo sapiens

<400> 101
cagtcctgc tgacgcagcc gcctcagtg tctggggccc cagggcagag ggtcaccatc 60
tcctgcactg ggagcagctc caacatcggg gcaggtatg atgtacactg gtaccagcag 120
tttccaggaa cagccccaa actcctcatc tatggtaaca gcaatcggcc ctcagggtc 180
cctgaccat tctctggctc caagtctggc acctcagct ccctggccat cactgggctc 240
cagctgagg atgaggctga ttattactgc cagtcctatg acagcagcct gagtggtcg 300
gtattcggcg gagggaccaa gctgaccgtc ctag 334

<210> 102
<211> 111
<212> PRT
<213> Homo sapiens

<400> 102
Gln Ser Leu Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Phe Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 103
<211> 375
<212> DNA
<213> Homo sapiens

<400> 103
caggtgcagc tgggtggagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt taccttcagt agttatgaca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaagtaa taaataccat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaat 300
actatggttc ggggggggga ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 104
<211> 125
<212> PRT
<213> Homo sapiens

<400> 104
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr His Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95

Ala Arg Glu Asn Thr Met Val Arg Gly Gly Asp Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 105
<211> 324
<212> DNA
<213> Homo sapiens

<400> 105
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaaggat tatgcaagct ggtaccagca gaagccagga 120
caggccccta tacttgtcat ctatggtaaa aacaaccggc cctcagggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactggggc tcaggcgaa 240
gatgaggctg actattactg taactcccgg gacagcagtg gtaaccatct ggtgttcggc 300
ggagggacca agctgaccgt ccta 324

<210> 106
<211> 108
<212> PRT
<213> Homo sapiens

<400> 106
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Arg Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 107
<211> 366
<212> DNA
<213> Homo sapiens

<400> 107
caggttcagc tgggtcagtc tggagctgag gtgaagaagc ctggggcctc agtgaaggtc 60
tcctgcaagg cttctgtta cacctttacc agctatggta tcagctgggt ggcacaggcc 120
cctggacaag ggcttgatgt gatggatgg atcagcgctt acaatgttaa cacaaactat 180
gcacagaagc tccagggcag agtcaccatg accacagaca catccacgaa cacagcctac 240
atggaactga ggagcctgag atctgacgac acggccgtgt attactgtgc gagagatcct 300
ataactgaaa cttatggagga ctactttgac tactggggcc agggaaacctt ggtcaccgtc 360
tcctca 366

<210> 108
<211> 122
<212> PRT
<213> Homo sapiens

<400> 108
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Ser Tyr
20 25 30
Gly Ile Ser Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Ser Ala Tyr Asn Val Asn Thr Asn Tyr Ala Gln Lys Leu
50 55 60
Gln Gly Arg Val Thr Met Thr Asp Thr Ser Thr Asn Thr Ala Tyr
65 70 75 80
Met Glu Leu Arg Ser Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Pro Ile Thr Glu Thr Met Glu Asp Tyr Phe Asp Tyr Trp
100 105 110
Gly Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 109
<211> 324
<212> DNA
<213> Homo sapiens

<400> 109
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaaactat tatgcaagtt ggtaccagca gaagccagga 120
caggccccta tacttgcat ctatggtaaa aacaaccggc cctcagggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactgggc tcaggcggaa 240
gatgagggctg actattactg taactcccgg gacagcagtg gtaatcatct ggtattcggc 300
ggagggacca agttgaccgt ccta 324

<210> 110
<211> 107
<212> PRT
<213> Homo sapiens

<400> 110
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Asn Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95

Leu Val Phe Gly Gly Gly Thr Lys Leu Thr Val
100 105

<210> 111
<211> 366
<212> DNA
<213> Homo sapiens

<400> 111
caggtgcagc tgggggagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtcagc cgtctggatt cacccatcagc agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatgtatg atggaaagaaa taaatacaat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgtattacg atatttggg cggtatggac gtctgggccc aagggaccac ggtcaccgtc 360
tcctca 366

<210> 112
<211> 122
<212> PRT
<213> Homo sapiens

<400> 112
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
100 105 110
Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 113
<211> 333
<212> DNA
<213> Homo sapiens

<400> 113
cagtctgtgc tgacgcagtc gccctcagtg tctggggccc cagggcagag ggtcaccatc 60
tcctgcactg ggagcagctc caacatcggt gcaggtatg atgtacactg gtaccagcag 120
cttccaggaa cagccccag actcctcatt tatggtaaca acaatcgatc ctcaggggtc 180
cctgaccat tctctggctc caagtctggc acctcagcct ccctggccat cactgggttc 240
caggctgagg atgaggctga ttattactgc cagtctatg acagcagcct gagtggttcg 300
gtttcggcg gagggaccaa gctgaccgtc cta 333

<210> 114
<211> 111
<212> PRT
<213> Homo sapiens

<400> 114
Gln Ser Val Leu Thr Gln Ser Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Arg Leu
35 40 45
Leu Ile Tyr Gly Asn Asn Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 115
<211> 366
<212> DNA
<213> Homo sapiens

<400> 115
caggtgcagc tgggtggagtc tgggggagggc gtggccagc ctgggaggc cctgagactc 60
tcctgtcagc cgtctggatt caccttcagc agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatgtatg atggaagaaa taaatacaat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgtattacg atatttggg cggtatggac gtctgggccc aagggaccac ggtcaccgtc 360
tcctca 366

<210> 116
<211> 122
<212> PRT
<213> Homo sapiens

<400> 116
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp

100 105 110
Gly Gln Gly Thr Thr Val Val Ser Ser
115 120

<210> 117
<211> 324
<212> DNA
<213> Homo sapiens

<400> 117
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaagatat tatgcaagct ggtaccagca gaagccagga 120
caggccccta tagttgtcat ctatggtaaa aaaaacccgc cctcagggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactggggc tcaggcggaa 240
gatgaggctg actattactg taagtcccgg gacagcagtg gtaaccatct ggtattcggc 300
ggagggacca agctgaccgt ccta 324

<210> 118
<211> 108
<212> PRT
<213> Homo sapiens

<400> 118
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Arg Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Val Val Ile Tyr
35 40 45
Gly Lys Lys Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 119
<211> 345
<212> DNA
<213> Homo sapiens

<400> 119
gaggtgcagc tgggtggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactaca tgagctgggt ccgccaggct 120
ccagggaaagg gtctggagtg ggtctcagtt atttatacgcg gtgggtggcac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaatgaaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggaccgggg 300
tcctttgact actggggcca gggAACCTG gtcaccgtct cctca 345

<210> 120
<211> 115

<212> PRT

<213> Homo sapiens

<400> 120

Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Pro Gly Ser Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
100 105 110
Val Ser Ser
115

<210> 121

<211> 321

<212> DNA

<213> Homo sapiens

<400> 121

gacatccaga tgacccagtc tccatcttcc gtgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgtc gggcgagtca gggtattagc agctggtag cctggtatca gcagaaacca 120
gggaaagccc ctaagctcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tgggacagat tttactctca ccatcagcag cctgcagcct 240
gaagattttg caagttacta ttgtcaacag gctaacagtt tcccgtggac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 122

<211> 107

<212> PRT

<213> Homo sapiens

<400> 122

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Val Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Ser Ser Trp
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Ser Tyr Tyr Cys Gln Gln Ala Asn Ser Phe Pro Trp
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 123
<211> 369
<212> DNA
<213> Homo sapiens

<400> 123
caggtgcagc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtcag cgtctggatt cacccatcgat agctatggca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggatg ggtggcagtt atatgtatg atgaaatgtat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagcgg 300
gatagcagtg gctggtacta ctacggatg gacgctggg gccaaggac cacggtcacc 360
gtctcctca 369

<210> 124
<211> 123
<212> PRT
<213> Homo sapiens

<400> 124
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Arg Asp Ser Ser Gly Trp Tyr Tyr Tyr Gly Met Asp Val
100 105 110
Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 125
<211> 321
<212> DNA
<213> Homo sapiens

<400> 125
gacatccaga tgaccaggc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcg gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca cagtcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtc tcccgctcac tttcggcgg 300
gggaccaagg ttgagatcaa a 321

<210> 126
<211> 107

<212> PRT
<213> Homo sapiens

<400> 126

Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Ser	Leu	Ser	Ala	Ser	Val	Gly
1															15
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Gly	Ile	Arg	Asn	Asp
	20														30
Leu	Gly	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Arg	Leu	Ile
	35														45
Tyr	Ala	Ala	Ser	Ser	Leu	Gln	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
	50														60
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Val	Ser	Ser	Leu	Gln	Pro
	65														80
Glu	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Leu	Gln	His	Asn	Ser	Leu	Pro	Leu
															95
Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys					
															100
															105

<210> 127
<211> 378
<212> DNA
<213> Homo sapiens

<400> 127

caggtgcagc tgggggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt aactatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaagtaa taaatactat 180
gcagactccg tgaagggccc attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaataatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagggg 300
atagcagtgg ctggtcctcc ttactactac tacggtatgg acgtctgggg ccaagggacc 360
acggtcaccg tctcctca 378

<210> 128
<211> 126
<212> PRT
<213> Homo sapiens

<400> 128

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg
1															15
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Asn	Tyr
	20														30
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
	35														45
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Asn	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
	50														60
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
	65														80
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
															95
Ala	Arg	Glu	Gly	Ile	Ala	Val	Ala	Gly	Pro	Pro	Tyr	Tyr	Tyr	Tyr	Gly
															110
Met	Asp	Val	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser		

115

120

125

<210> 129
<211> 318
<212> DNA
<213> Homo sapiens

<400> 129
gacatccaga tgaccaggc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcc aggcgagtca ggacattagc aactattaa attggtatca gcagaaaacca 120
ggaaaagccc ctaagctcct gatctacgat gcatccaatt tggaaacagg ggtcccatca 180
aggttcagtg gaagtggatc tgggacagat tttacttca ccatcagcag cctgcagcct 240
gaagatattg caacatatta ctgtcaccag tgtgataatc tccctcactt cggccaaggg 300
acacgactgg agattaaa 318

<210> 130
<211> 106
<212> PRT
<213> Homo sapiens

<400> 130
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Gln Ala Ser Gln Asp Ile Ser Asn Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile
35 40 45
Tyr Asp Ala Ser Asn Leu Glu Thr Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Phe Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Ile Ala Thr Tyr Tyr Cys His Gln Cys Asp Asn Leu Pro His
85 90 95
Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 131
<211> 369
<212> DNA
<213> Homo sapiens

<400> 131
caggtgcagc tgggtggagtc tgggggagggc gtgggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt aatcttcagt agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaagtaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagcgg 300
gatacgatgt gctggtacta ctacggtatg gacgtctggg gccaaggac cacggtcacc 360
gtctcctca 369

<210> 132
<211> 123
<212> PRT

<213> Homo sapiens

<400> 132
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Leu Ile Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Arg Asp Ser Ser Gly Trp Tyr Tyr Tyr Gly Met Asp Val
100 105 110
Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 133

<211> 321

<212> DNA

<213> Homo sapiens

<400> 133
gacatccaga tgaccaggc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcacttgcc gggcaagtca ggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcctccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtgcgatc tggacagaaa ttcaccctca caatcagcag cctgcagcct 240
gaagattttg caagttatta ctgtctacag cataggagtt accccgtcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 134

<211> 107

<212> PRT

<213> Homo sapiens

<400> 134
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Ala Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Arg Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Ser Tyr Tyr Cys Leu Gln His Arg Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 135
<211> 345
<212> DNA
<213> Homo sapiens -

<400> 135
gaggtgcagc tgggggggtc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactaca tgagctgggt ccggccaggct 120
ccagggaagg ggctggagtg ggtctcagtt atttatacgat gtggtagcac atactacgca 180
gactccgtga agggcccattt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggcaagga 300
ggtatggacg tctggggcca aaggaccacg gtcaccgtct cctca 345

<210> 136
<211> 115
<212> PRT
<213> Homo sapiens

<400> 136
Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Glu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val Thr
100 105 110
Val Ser Ser
115

<210> 137
<211> 321
<212> DNA
<213> Homo sapiens

<400> 137
gaaatagtga tgacgcagtc tccatccacc ctgtctgtgt ctccaggggaa aagagccacc 60
cttcctgca gggccagtca gagtgttagc agcaacttag cctggtagca gcagaaacct 120
ggccaggctc ccaggctcct catctatggt gcatccatca gggccactgg tatcccagcc 180
aggttcagtg gcagtgggtc tgggacagag tacactctca ccatcagcag cctgcagtt 240
gaagattttg cagtttatta ctgtcaacag tataataact ggccattcac tttcggccct 300
gggaccaaaag tggatataa a 321

<210> 138
<211> 107
<212> PRT
<213> Homo sapiens

<400> 138

Glu Ile Val Met Thr Gln Ser Pro Ser Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Ile Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Tyr Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Phe
85 90 95
Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
100 105

<210> 139

<211> 348

<212> DNA

<213> Homo sapiens

<400> 139

caggtgcagc tgggtggagtc tgggggagggc ttgggtcaagc ctggagggtc cctgagactc 60
tcctgtgcag cctctggatt caccttcagt gactactaca tgagctggat ccgcaggct 120
ccagggaaagg ggctggagtg ggttcatac attagtagaa gtggtagtac catatactac 180
gcagactctg tgaagggccg attcaccatc tccaggaca acgccaagaa ctcactgtat 240
ctgcaaatga acagcctgag agccgaggac acggccgtgt attactgtgc gagatctta 300
ggcgttatgg acgtctgggg ccaaggacc acggtcaccg tctcctca 348

<210> 140

<211> 116

<212> PRT

<213> Homo sapiens

<400> 140

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr
20 25 30
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Arg Ser Gly Ser Thr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Ser Leu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val
100 105 110
Thr Val Ser Ser
115

<210> 141
<211> 321
<212> DNA
<213> Homo sapiens

<400> 141
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcgcc 60
atcacttgcc ggacaagtca gagcattagc agttatttaa attggtatca gcagaaaacca 120
ggaaaagccc ctgagctcct gatctatgct gcatccaatt tgcaaagtgg ggtcccatca 180
aggttcagtg gcagtggatc tggacagat ttcactctca ccatcagcag tctgcaacct 240
gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac ctgcggccaa 300
gggacacgac tggagattaa a 321

<210> 142
<211> 107
<212> PRT
<213> Homo sapiens

<400> 142
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Ala Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Leu Leu Ile
35 40 45
Tyr Ala Ala Ser Asn Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 143
<211> 345
<212> DNA
<213> Homo sapiens

<400> 143
gaggtgcagc tgggggggtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactacg tgaactgggt ccggcaggct 120
ccagggaaagg ggctggagtg ggtctcagtt atttataacg ctggtagcgc gtactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtttttt 240
caaatgaaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggaactggg 300
gcctttgact actggggcca gggaaaccctg gtcaccgtct cctca 345

<210> 144
<211> 115
<212> PRT
<213> Homo sapiens

<400> 144
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly

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<210> 145
<211> 321
<212> DNA
<213> Homo sapiens
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<400> 145
gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagccacc 60
ctctcctgca gggccagtca gagtgttagc agcaacttag cctggtagcca gcagaaacct 120
ggccaggctc ccagactctt catctatggt gcatccacca gggccactgg tatcccagcc 180
aggttcagtg gcagtaggac tgggacagag ttcaactctca ccatcagcag cctgcagtct 240
gaagattttg cagtttatta ctgtcagcag tataataact ggcctctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 146
<211> 107
<212> PRT
<213> *Homo sapiens*

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<400> 146
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Arg Thr Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

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<210> 147
<211> 348
<212> DNA

<213> Homo sapiens

<400> 147

caggtgcagc tgggtggagtc tgggggaggc ttggtaaagc ctggagggtc cctgagactc 60
tcctgtgcag cctctggatt cacccatgt gactactaca tgagctggat ccggcaggct 120
ccagggaaagg ggctggagtg ggttcatac attagtagaa gtggtagtac cataactac 180
gcagactctg tgaagggccg attcaccatc tccaggaca acgccaagaa ctcactgtat 240
ctgcaaatga acagcctgag agccgaggac acggccgtgt attactgtgc gagatctta 300
ggcggtatgg acgtctgggg ccaagggacc acggtcaccg ttcctca 348

<210> 148

<211> 116

<212> PRT

<213> Homo sapiens

<400> 148

Gln Val Gln Leu Val Glu Ser Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr
20 25 30
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Arg Ser Gly Ser Thr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Ser Leu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val
100 105 110
Thr Val Ser Ser
115

<210> 149

<211> 321

<212> DNA

<213> Homo sapiens

<400> 149

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcacccgcc ggacaagtca gacatttagc agctattaa actggtatca ccagaaacca 120
gggaaagccc ctgagctcct gatctatgct gcattcaatt tacaaagtgg ggtcccatca 180
aggttcagtg gcagtggatc tggacagat ttcactctca ccatcagcag tctgcaacct 240
gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac cttcgccaa 300
gggacacgac tggagattaa a 321

<210> 150

<211> 107

<212> PRT

<213> Homo sapiens

<400> 150

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15

Asp Arg Val Thr Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
 20 25 30
 Leu Asn Trp Tyr His Gln Lys Pro Gly Lys Ala Pro Glu Leu Leu Ile
 35 40 45
 Tyr Ala Ala Phe Asn Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile
 85 90 95
 Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
 100 105

<210> 151
 <211> 345
 <212> DNA
 <213> Homo sapiens

<400> 151
 gaggtgcagc tgggggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
 tcctgtgcag cctctgggtt caccgtcagt agcaactaca tggctgggt ccggcaggct 120
 ccagggaaagg ggctggagtg ggtctcagtt atttatacggt gtggtagcac atactacgca 180
 gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
 caaatgaaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggcgaagga 300
 ggtatggacg tctggggcca agggaccacg gtcaccgtct cctca 345

<210> 152
 <211> 115
 <212> PRT
 <213> Homo sapiens

<400> 152
 Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
 20 25 30
 Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
 50 55 60
 Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
 65 70 75 80
 Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
 85 90 95
 Arg Gly Glu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val Thr
 100 105 110
 Val Ser Ser
 115

<210> 153
 <211> 324
 <212> DNA
 <213> Homo sapiens

<400> 153
tcctatgagc tgacacagcc accctcggtg tcagtgtccc caggacaaac ggccaggatc 60
acctgctctg gagatgcatt gccaaaaaaaaa tatgtttatt ggtaccagca gaagtcaggc 120
cagggccctg tgctggcat ctatgaggac agcaaacgac cctccggat ccctgagaga 180
ttctctggct ccagctcagg gacaatggcc accttgacta tcaatgggc ccaggtggag 240
gatgaagctg actactactg ttactcaacg gacagcagtg gtaatcatgt ggtattcggc 300
ggagggacca agctgaccgt ccta 324

<210> 154
<211> 108
<212> PRT
<213> Homo sapiens

<400> 154
Ser Tyr Glu Leu Thr Gln Pro Pro Ser Val Ser Val Pro Gly Gln
1 5 10 15
Thr Ala Arg Ile Thr Cys Ser Gly Asp Ala Leu Pro Lys Lys Tyr Val
20 25 30
Tyr Trp Tyr Gln Gln Lys Ser Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Glu Asp Ser Lys Arg Pro Ser Gly Ile Pro Glu Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Thr Met Ala Thr Leu Thr Ile Asn Gly Ala Gln Val Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Tyr Ser Thr Asp Ser Ser Gly Asn His
85 90 95
Val Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 155
<211> 321
<212> DNA
<213> Homo sapiens

<400> 155
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcg ggacaaagtca gaggcatttc agctatttaa attggatataca gcagaaaacca 120
gggaaagccc ctgaggtcct gatctatgct gcatccaatt tgcaacgtgg ggtcccatca 180
aggttcagtg gcagtggatc tggacagat ttcactctca ccatcagcag tctgcaacct 240
gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac ctccggccaa 300
gggacacgac tggagattaa a 321

<210> 156
<211> 107
<212> PRT
<213> Homo sapiens

<400> 156
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Val Leu Ile

35	40	45
Tyr Ala Ala Ser Asn Leu Gln Arg Gly Val Pro Ser Arg Phe Ser Gly		
50	55	60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro		
65	70	75
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile		
85	90	95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys		
100	105	

<210> 157
<211> 369
<212> DNA
<213> Homo sapiens

<400> 157
gagggtgcagc tgggtggagtc tggggggaggc ctgggtcaagc ctgggggggtc cctgagactc 60
tcctgtgcag cctctggatt caccttcagt agctatacgca tgaactgggt cccgcaggct 120
ccagggaaagg ggcttggagtg ggtctcatct attagtagta gtagtagtta catatactac 180
gcagactcag tgaaggggccg attcaccatc tccagagaca acggcaagaa ctcactgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gaggggggggt 300
ataactggaa ctacgaacta ctacggatg gacgtctggg gccaaggac cacggtcacc 360
gtctcctca 369

<210> 158
<211> 123
<212> PRT
<213> Homo sapiens

<400> 158
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Ser Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Ser Ile Ser Ser Ser Tyr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Gly Gly Ile Thr Gly Thr Thr Asn Tyr Tyr Gly Met Asp Val
100 105 110
Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 159
<211> 321
<212> DNA
<213> Homo sapiens

<400> 159

gacatccaga tgaccaggc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaattgcc ggacaagtca gacgattagc agctattaa attggtatca gcagaaacca 120
gggaaagccc ctgaactcct gatctatgct gcatttaatt tgcaaagtgg ggtcccatca 180
aggatcagtg gcagtggatc tgggacagat ttcactctca ccatcagcag tctgcaccct 240
gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac cttcggccaa 300
gggacacgac tggagattaa a 321

<210> 160
<211> 107
<212> PRT
<213> Homo sapiens

<400> 160
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Leu Leu Ile
35 40 45
Tyr Ala Ala Phe Asn Leu Gln Ser Gly Val Pro Ser Arg Ile Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu His Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 161
<211> 375
<212> DNA
<213> Homo sapiens

<400> 161
caggtgcagc tggcagtc tggggctgag gtgaagaagc ctggggcctc agtgaaggc 60
tcctgcagg cttctggata cacccacc ggctactata tgcactgggt gcgcacaggcc 120
cctggacaag ggcttgagtg gatgggatgg atcaacccta acagtgggtt cacaactat 180
gcacagaagt ttcaggcag ggtcaccatg accaggaca cgtccatca gacgcctac 240
atggagctga gcaggctgag atctgacgac acggccgtgt attactgtgc gagagccct 300
ctctggacgg tacgttagctg gtactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 162
<211> 125
<212> PRT
<213> Homo sapiens

<400> 162
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Gly Tyr
20 25 30
Tyr Met His Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45

Gly Trp Ile Asn Pro Asn Ser Gly Gly Thr Asn Tyr Ala Gln Lys Phe
 50 55 60
 Gln Gly Arg Val Thr Met Thr Arg Asp Thr Ser Ile Ser Thr Ala Tyr
 65 70 75 80
 Met Glu Leu Ser Arg Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Ala Pro Leu Trp Thr Val Arg Ser Trp Tyr Tyr Gly Met
 100 105 110
 Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120 125

<210> 163
 <211> 330
 <212> DNA
 <213> Homo sapiens

<400> 163
 cagtctgtat tgacgcagcc gccctcaatg tctgcggccc caggacagaa ggtcaccatc 60
 tcctgctctg gaagcagctc caacattggg aataattatg tatcctggta ccagcagctc 120
 ccaggaatag cccccaaact cctcatttat gacaataata agcgaccctc agggattcct 180
 gaccgattct ctggctccaa gtctggcacg tcagccaccc tgggcatcac cggactccag 240
 actggggacg aggccgatta ttactgcgga acatggata gcagcctgag tgctgggtg 300
 ttccggcggag ggaccaagct gaccgtccta 330

<210> 164
 <211> 110
 <212> PRT
 <213> Homo sapiens

<400> 164
 Gln Ser Val Leu Thr Gln Pro Pro Ser Met Ser Ala Ala Pro Gly Gln
 1 5 10 15
 Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Asn Asn
 20 25 30
 Tyr Val Ser Trp Tyr Gln Gln Leu Pro Gly Ile Ala Pro Lys Leu Leu
 35 40 45
 Ile Tyr Asp Asn Asn Lys Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser
 50 55 60
 Gly Ser Lys Ser Gly Thr Ser Ala Thr Leu Gly Ile Thr Gly Leu Gln
 65 70 75 80
 Thr Gly Asp Glu Ala Asp Tyr Tyr Cys Gly Thr Trp Asp Ser Ser Leu
 85 90 95
 Ser Ala Gly Val Phe Gly Gly Thr Lys Leu Thr Val Leu
 100 105 110

<210> 165
 <211> 348
 <212> DNA
 <213> Homo sapiens

<400> 165
 gaggtgcagc tgggtgcagtc tggagcagag gtgaaaaagc cggggagtc tctgaagatc 60
 tcctgttata cttcttaacc cagtttacc agctactgga tcggctgggt gcgccagatg 120

ccggaaag gcctggagt gatgggatc atctatctt gtgactcaga taccagatac 180
agccgtcct tccaaggcca ggtcaccatc tcagccgaca agtccatcag taccgcctac 240
ctgcagtgga gcagcctgaa ggcctcgac accgcatgt attactgtgc gagaagtaac 300
tgggtcttg actactggg ccagggacc ctggtcaccg ttcctca 348

<210> 166
<211> 116
<212> PRT
<213> Homo sapiens

<400> 166
Glu Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Glu
1 5 10 15
Ser Leu Lys Ile Ser Cys Lys Thr Ser Glu Tyr Ser Phe Thr Ser Tyr
20 25 30
Trp Ile Gly Trp Val Arg Gln Met Pro Gly Lys Gly Leu Glu Trp Met
35 40 45
Gly Ile Ile Tyr Leu Gly Asp Ser Asp Thr Arg Tyr Ser Pro Ser Phe
50 55 60
Gln Gly Gln Val Thr Ile Ser Ala Asp Lys Ser Ile Ser Thr Ala Tyr
65 70 75 80
Leu Gln Trp Ser Ser Leu Lys Ala Ser Asp Thr Ala Met Tyr Tyr Cys
85 90 95
Ala Arg Ser Asn Trp Gly Leu Asp Tyr Trp Gly Gln Gly Thr Leu Val
100 105 110
Thr Val Ser Ser
115

<210> 167
<211> 333
<212> DNA
<213> Homo sapiens

<400> 167
cagtctgtgc tgacgcagcc gccctcagtg tctggggccc cagggcagag ggtcaccatc 60
tcctgcactg ggagcagttc caacatcggt gcaggtatg atgtacactg gtaccagcag 120
tttccaggaa cagccccaa actcctcatc caaggttaca gcaatcggtt ctcaggggtc 180
cctgaccgtat tctctggctc caagtctggc acctcagcct ccctggccat cactgggttc 240
caggctgagg atgaggctga ttattactgc cagtcctatg acagcagcct gagtggttcg 300
gtttcggcggc gaggaccaa gctgaccgtc ctt 333

<210> 168
<211> 111
<212> PRT
<213> Homo sapiens

<400> 168
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Phe Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Gln Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe

50	55	60														
Ser	Gly	Ser	Lys	Ser	Gly	Thr	Ser	Ala	Ser	Leu	Ala	Ile	Thr	Gly	Leu	
65															80	
Gln	Ala	Glu	Asp	Glu	Ala	Asp	Tyr	Tyr	Cys	Gln	Ser	Tyr	Asp	Ser	Ser	
															95	
Leu	Ser	Gly	Ser	Val	Phe	Gly	Gly	Thr	Lys	Leu	Thr	Val	Leu			
														100	105	110

<210> 169
 <211> 351
 <212> DNA
 <213> Homo sapiens

<400> 169
 cagttcagc tggcagtc tggagctgag gtgaagaagc ctggggcctc agtgaaggc 60
 tcctgcaagg cttctggta caccttacg ttctatagta tcacctgggt ggcacaggcc 120
 cctggacaag ggcttgatgt gatggatgg atcagcgctt acaatgataa cacaactat 180
 gcacagaagc tccaggcag agtcaccatg accacagaca catccacgag cacagcctac 240
 atgaaactga ggagcctgag atctgacgac acggccgtgt attactgtgc gagaacgttt 300
 accagtggct ttgactactg gggccaggga accctggta ccgtctcc 351

<210> 170
 <211> 117
 <212> PRT
 <213> Homo sapiens

<400> 170
 Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
 1 5 10 15
 Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Phe Tyr
 20 25 30
 Ser Ile Thr Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
 35 40 45
 Gly Trp Ile Ser Ala Tyr Asn Asp Asn Thr Asn Tyr Ala Gln Lys Leu
 50 55 60
 Gln Gly Arg Val Thr Met Thr Asp Thr Ser Thr Ser Thr Ala Tyr
 65 70 75 80
 Met Glu Leu Arg Ser Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Thr Phe Thr Ser Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu
 100 105 110
 Val Thr Val Ser Ser
 115

<210> 171
 <211> 324
 <212> DNA
 <213> Homo sapiens

<400> 171
 tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
 acatgccaag gagacagcct cagaaggat tatgcaagct ggtaccagca gaagccagga 120
 caggccccta tacttgtcat ctatggtaaa aacaaccggc cctcaggat cccagaccga 180

ttctctggct ccagctcagg aaacacagct tccttaccca tcactggggc tcaggcggaa 240
gatgaggctg actattactg taactcccg gacagcagtg gtaaccatct ggtgttcggc 300
ggagggacca agctgaccgt ccta 324

<210> 172
<211> 108
<212> PRT
<213> Homo sapiens

<400> 172
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Arg Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 173
<211> 375
<212> DNA
<213> Homo sapiens

<400> 173
caggtgcagc tgggtggagtc tgggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt taccttcagt agttatgaca tgcactgggt ccgccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaagtaa taaataccat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaat 300
actatggttc gggggggggga ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 174
<211> 125
<212> PRT
<213> Homo sapiens

<400> 174
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr His Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr

65	70	75	80
Leu Gln Met Asn Ser	Leu Arg Ala Glu Asp	Thr Ala Val Tyr	Tyr Cys
85	90	95	
Ala Arg Glu Asn Thr Met Val Arg	Gly Gly Asp	Tyr Tyr	Gly Met
100	105	110	
Asp Val Trp Gly Gln Gly	Thr Thr Val Thr	Val Ser Ser	
115	120	125	

<210> 175
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 175
 gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
 atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
 agggaaagccc ctaagcgctt gatctttgct gcgtccagtt tgcaaagtgg ggtcccatca 180
 aggttcagcg gcagtggatc tggccagaa ttcactctca caatcagcag cctgcagcct 240
 gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
 gggaccaagg tggagatcaa a 321

<210> 176
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 176
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Arg Lys Ala Pro Lys Arg Leu Ile
 35 40 45
 Phe Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
 85 90 95
 Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 177
 <211> 354
 <212> DNA
 <213> Homo sapiens

<400> 177
 caggtgcagc tgcaggagtc gggcccagga ctggtaagc cttcgagac cctgtccctc 60
 acctgcactg tctctgggtgg ctccatcagt agttactact ggagctggat ccggcagccc 120
 ccagggaaagg gactggatgt gattgggtat ttcttattaca gtgggagcac caactacaac 180
 ccctccctca agagtcgagt caccatatca gtagacacgt ccaagaacca gttctccctg 240
 aagctgaggt ctgtgaccgc tgcggacacg gccgtgtatt actgtgcgag agataggttt 300

accagtggct ggtttgacta ctggggccag ggaaccctgg tcaccgtctc ctca 354

<210> 178

<211> 118

<212> PRT

<213> Homo sapiens

<400> 178

Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Glu

1 5 10 15

Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Tyr

20 25 30

Tyr Trp Ser Trp Ile Arg Gln Pro Pro Gly Lys Gly Leu Glu Trp Ile

35 40 45

Gly Tyr Phe Tyr Tyr Ser Gly Ser Thr Asn Tyr Asn Pro Ser Leu Lys

50 55 60

Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe Ser Leu

65 70 75 80

Lys Leu Arg Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr Cys Ala

85 90 95

Arg Asp Arg Phe Thr Ser Gly Trp Phe Asp Tyr Trp Gly Gln Gly Thr

100 105 110

Leu Val Thr Val Ser Ser

115

<210> 179

<211> 321

<212> DNA

<213> Homo sapiens

<400> 179

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60

atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120

aggaaagccc ctaagcgctt gatcttgct gcgtccagtt tgcaaagtgg ggtcccatca 180

aggttcagcg gcagtggtac tggccagaa ttcactctca caatcagcag cctgcagcct 240

gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300

gggaccaagg tggagatcaa a 321

<210> 180

<211> 107

<212> PRT

<213> Homo sapiens

<400> 180

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly

1 5 10 15

Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp

20 25 30

Leu Gly Trp Tyr Gln Gln Lys Pro Arg Lys Ala Pro Lys Arg Leu Ile

35 40 45

Phe Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly

50 55 60

Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro

65 70 75 80

Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 181
<211> 345
<212> DNA
<213> Homo sapiens

<400> 181
gaggtgcagc tgggggggtc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt aacaactaca tgcactgggt ccgcaggct 120
ccaggaaagg ggctggagtg ggtctcagtt atttatacg tggtaaacac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctatttctt 240
caaataaca gcctgaaaac cgaggacacg gccgtgtt actgtgcgag aggtccccc 300
gctttgata tctggggcca agggacaatg gtcaccgtct cttca 345

<210> 182
<211> 115
<212> PRT
<213> Homo sapiens

<400> 182
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Asn Asn
20 25 30
Tyr Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Asn Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Phe Leu
65 70 75 80
Gln Met Asn Ser Leu Lys Thr Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Pro Gly Ala Phe Asp Ile Trp Gly Gln Gly Thr Met Val Thr
100 105 110
Val Ser Ser
115

<210> 183
<211> 321
<212> DNA
<213> Homo sapiens

<400> 183
gaaatagtga tgacgcagtc tccagccacc ctgtctgtt ctccaggaa aagagtcacc 60
cttcctgca gggccagtca gagtgttacc agcaacttag cctggatcca gcagaaacct 120
ggccaggctc ccaggcttacc catctatggt gcatccacca gggccactgg tatcccagcc 180
agattcagtg gcagtgggtc tggacacagag ttcactctca ccatcagcag cctgcagtct 240
gaagattttgc cagtttattt ctgtcagcag tataataact ggccttcac cttcgccaa 300
gggacacgac tggagattaa a 321

<210> 184
<211> 107
<212> PRT
<213> Homo sapiens

<400> 184
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Val Thr Leu Ser Cys Arg Ala Ser Gln Ser Ala Thr Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Phe
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 185
<211> 345
<212> DNA
<213> Homo sapiens

<400> 185
gaggtgcagc tggggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtcag cctctgggtt caccgtcagt agcaactaca tgagttgggt ccgcaggct 120
ccagggagg ggctggagtg ggtctcagtt atttatacg cgatggtagcac atactacgca 180
gactccgtga aggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaatgaaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggtcccg 300
gctttgata tctggggcca aggacaatg gtcaccgtct cttca 345

<210> 186
<211> 115
<212> PRT
<213> Homo sapiens

<400> 186
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Pro Gly Ala Phe Asp Ile Trp Gly Gln Gly Thr Met Val Thr

100

105

110

Val Ser Ser

115

<210> 187

<211> 327

<212> DNA

<213> Homo sapiens

<400> 187

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcc gggcaagtca gggcattaga aatgatttag gctgggttca gcagaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccaatt ttctaagtgg ggtcccatca 180
aggttcagcg gcagtggtc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagatttta caacttatta ctgtctacag cataatcctt accctccgag gctcacttcc 300
ggcggaggga ccaaggtaga gatcaaa 327

<210> 188

<211> 109

<212> PRT

<213> Homo sapiens

<400> 188

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Phe Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Asn Phe Leu Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Thr Thr Tyr Tyr Cys Leu Gln His Asn Pro Tyr Pro Pro
85 90 95
Arg Leu Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 189

<211> 363

<212> DNA

<213> Homo sapiens

<400> 189

caggtgcagc tgggtggagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatgtatg atggaaagtaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagggg 300
gactacggtg gtaaccctta cttgactac tggggccagg gaaccctggt caccgtctcc 360
tca 363

<210> 190

<211> 121
<212> PRT
<213> Homo sapiens

<400> 190
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Gly Asp Tyr Gly Gly Asn Pro Tyr Phe Asp Tyr Trp Gly
100 105 110
Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 191
<211> 324
<212> DNA
<213> Homo sapiens

<400> 191
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaagctat tatgcaagct ggtaccagca gaagccagga 120
caggccccctg tacttgtcat ctatggtaaa aacaaccggc cctcaggat cccagaccga 180
ttctctggct ccagctcaga aaacacagct tccttgacca tcactggggc tcaggcggaa 240
gatgaggctg actattactg taagtccccgg gacagcagtt ttaaccatct ggtattcggc 300
ggagggacca agttgaccgt ccta 324

<210> 192
<211> 108
<212> PRT
<213> Homo sapiens

<400> 192
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Glu Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Phe Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu

100

105

<210> 193
<211> 363
<212> DNA
<213> Homo sapiens

<400> 193
caggtgcacc tgggggaggtc tgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggcatg atggaagtaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtac aagagagggg 300
gactacggtg gttaccctta ctttgactac tggggccagg gaaccctggt caccgtctcc 360
tca 363

<210> 194
<211> 121
<212> PRT
<213> Homo sapiens

<400> 194
Gln Val His Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp His Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Thr Arg Glu Gly Asp Tyr Gly Gly Tyr Pro Tyr Phe Asp Tyr Trp Gly
100 105 110
Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 195
<211> 324
<212> DNA
<213> Homo sapiens

<400> 195
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacatcct cagaagctat tatgcaagct ggtaccagca gaagccagga 120
cagccccctg tacttgtcat ctatggtaaa aacaaccggc cctcaggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactggggc tcaggcggaa 240
gatgaggctg actattactg taagtcccgg gacagcagtt ataaccatct ggtattcggc 300
ggagggacca aactgaccgt ccta 324

<210> 196

<211> 108
<212> PRT
<213> Homo sapiens

<400> 196
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ile Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Tyr Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 197
<211> 366
<212> DNA
<213> Homo sapiens

<400> 197
caggtgcagc tgggggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcaatt atatggatg atggaagtaa tgaataactat 180
ggagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgttt 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagatccc 300
ctccgtatag tagtggctgg ggactttgac tactggggcc agggAACCT ggtcaccgtc 360
tcctca 366

<210> 198
<211> 122
<212> PRT
<213> Homo sapiens

<400> 198
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Ile Ile Trp Tyr Asp Gly Ser Asn Glu Tyr Tyr Gly Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Phe
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Pro Leu Arg Ile Val Val Ala Gly Asp Phe Asp Tyr Trp
100 105 110

Gly Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 199
<211> 333
<212> DNA
<213> Homo sapiens

<400> 199
cagtcgtgc tgacgcagcc gccctcagtg tctggggccc cagggcttag ggtcaccatc 60
tcctgcactg gaaacagctc caacatcggt gcaggttatg atgtacactg gtaccagcag 120
cttccaggaa cagccccaa actcctcatc tatggtaaca gcaatcggtc ctcaggggtc 180
cctgaccat tctctggctc caagtctggc acctcagcct ccctggccat cactgggttc 240
caggtgagg atgagactga ttattactgc cagtcctatg acagcagcct gagtggttcg 300
gtattcggcg gagggaccaa gctgaccgtc cta 333

<210> 200
<211> 111
<212> PRT
<213> Homo sapiens

<400> 200
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Leu
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Asn Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Thr Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 201
<211> 363
<212> DNA
<213> Homo sapiens

<400> 201
caggtgcacc tggggaggc tggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtcag cgtctggatt caccttcagt agctatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggaggat ggtggcagtt atatggcatg atggaaagttaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtac aagagagggg 300
gactacgggtg gttaccctta ctttactac tggggccagg gaaccctggc caccgtctcc 360
tca 363

<210> 202
<211> 121

<212> PRT

<213> Homo sapiens

<400> 202

Gln Val His Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp His Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Thr Arg Glu Gly Asp Tyr Gly Gly Pro Tyr Phe Asp Tyr Trp Gly
100 105 110
Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 203

<211> 324

<212> DNA

<213> Homo sapiens

<400> 203

tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacatcct cagaagctat tatgcaagct ggtaccagca gaagccagga 120
cagcccccta tacttgtcat ctatggtaaa aacaaccggc cctcagggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactggggc tcaggcggaa 240
gatgaggctg actattactg taagtcccg gacagcagtt ataaccatct ggtattcggc 300
ggagggacca aactgaccgt ccta 324

<210> 204

<211> 108

<212> PRT

<213> Homo sapiens

<400> 204

Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ile Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Tyr Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 205
<211> 375
<212> DNA
<213> Homo sapiens

<400> 205
caggtgcagc tgggtggagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatg atggaagtaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag accgaggac acggctgtgt attactgtgc gagagagact 300
acggtgacta aggagggcta ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 206
<211> 125
<212> PRT
<213> Homo sapiens

<400> 206
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Thr Thr Val Thr Lys Glu Gly Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 207
<211> 321
<212> DNA
<213> Homo sapiens

<400> 207
gacatccaga tgacccagtc tccatcttcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
agtttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttgc caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgaa 300
gggaccaagg tggagatcaa a 321

<210> 208
<211> 107

<212> PRT

<213> Homo sapiens

<400> 208

Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Ser	Leu	Ser	Ala	Ser	Val	Gly
1					5				10					15	
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Gly	Ile	Arg	Asn	Asp
				20					25				30		
Leu	Gly	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Arg	Leu	Ile
					35			40				45			
Tyr	Ala	Ala	Ser	Ser	Leu	Gln	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
					50			55			60				
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro
					65			70			75		80		
Glu	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Leu	Gln	His	Asn	Ser	Tyr	Pro	Leu
					85				90			95			
Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys					
					100				105						

<210> 209

<211> 360

<212> DNA

<213> Homo sapiens

<400> 209

caggtgcagc	tggtgagtc	tggggaggc	gtggccagc	ctgggaggc	cctgagactc	60
tcctgtgcag	cgtctggatt	cacccatgt	acctatggca	tgcactgggt	ccgcccaggct	120
ccaggcaagg	ggctggagtg	ggtggcagtt	atatggatg	atggaagtaa	taaataactat	180
gcagactccg	tgaagggccg	attcaccatc	tccagagaca	attccaagaa	cacgctatat	240
ctgcaaatga	acagcctgag	agccgaggac	acggctgtgt	attactgtgc	gagatccgc	300
tacggtaact	gggggtgggtt	cgaccctgg	ggccaggaa	ccctggcac	cgtctcctca	360

<210> 210

<211> 120

<212> PRT

<213> Homo sapiens

<400> 210

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg	
1					5				10			15			
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Thr	Tyr
					20				25			30			
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
					35			40			45				
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Asn	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
					50			55			60				
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
					65			70			75		80		
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
					85				90			95			
Ala	Arg	Ser	Arg	Tyr	Gly	Asp	Trp	Gly	Trp	Phe	Asp	Pro	Trp	Gly	Gln
					100				105			110			
Gly	Thr	Leu	Val	Thr	Val	Ser	Ser								

115

120

<210> 211
<211> 330
<212> DNA
<213> Homo sapiens

<400> 211
cagtctgtgc tgactcagcc accctcagcg tctgggaccc ccgggcagag ggtcaccatc 60
tcttgttctg gaagcagctc caacatcgga agtaatactg taaactggta ccagcagctc 120
ccaggaacgg ccccaaact cctcatctat agtaataatc agcggccctc aggggtccct 180
gaccgattct ctggctccaa gtctggcacc tcagcctccc tggccatca g tggctccag 240
tctgaggatg aggctgatta ttactgtgca gcatggatg acagcctgaa tggtccggtg 300
ttcggcggag ggaccaagct gaccgtccta 330

<210> 212
<211> 110
<212> PRT
<213> Homo sapiens

<400> 212
Gln Ser Val Leu Thr Gln Pro Pro Ser Ala Ser Gly Thr Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Ser Asn.
20 25 30
Thr Val Asn Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Ser Asn Asn Gln Arg Pro Ser Gly Val Pro Asp Arg Phe Ser
50 55 60
Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Ser Gly Leu Gln
65 70 75 80
Ser Glu Asp Glu Ala Asp Tyr Tyr Cys Ala Ala Trp Asp Asp Ser Leu
85 90 95
Asn Gly Pro Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 213
<211> 366
<212> DNA
<213> Homo sapiens

<400> 213
caggtgcagc tggggaggc tggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacctcagt agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcaatt atatggatg atggaagtaa tgaatactat 180
ggagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtt 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagatccc 300
ctccgtatag tagtggctgg ggactttgac tactggggcc agggAACCTT ggtcaccgtc 360
tcctca 366

<210> 214
<211> 122
<212> PRT

<213> Homo sapiens

<400> 214
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Ile Ile Trp Tyr Asp Gly Ser Asn Glu Tyr Tyr Gly Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Phe
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Pro Leu Arg Ile Val Val Ala Gly Asp Phe Asp Tyr Trp
100 105 110
Gly Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 215

<211> 321

<212> DNA

<213> Homo sapiens

<400> 215
gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagccacc 60
ctctcctgca gggccagtca gagtgttatc agcaacttag cctggtagcca gcagcaacct 120
ggccaggctc ccaggctcct catctatggt gcatccacca gggccactgg tttcccgagcc 180
aggttcagtg gcagtgggtc tgggacagag ttcactctca ccatcagcag cctgcagtct 240
gaagattttg cagtttatta ctgtcagcag tataataact ggccgctcac tttcggcgga 300
321
gggaccaagg tggagatcaa a

<210> 216

<211> 107

<212> PRT

<213> Homo sapiens

<400> 216
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ile Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Phe Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 217
<211> 375
<212> DNA
<213> Homo sapiens

<400> 217
caggtgcagc tgggggaggtc tgggtccagc ctggggaggc cctgagactc 60
tcctgtcagc cgtctggatt caccttcagt agctatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaagtaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagact 300
acgtgacta aggagggctt ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 218
<211> 125
<212> PRT
<213> Homo sapiens

<400> 218
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Thr Thr Val Thr Lys Glu Gly Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 219
<211> 321
<212> DNA
<213> Homo sapiens

<400> 219
gacatccaga tgaccaggc tccatcttcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcaatggcc gggcaagtca gggcattaga aatgatggat gctggtatca gcagaaaacca 120
gggaaagccc ctaagcgccct gatctatgtc gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgaa 300
gggaccaagg tggagatcaa a 321

<210> 220
<211> 107
<212> PRT

<213> Homo sapiens

<400> 220
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 221

<211> 375

<212> DNA

<213> Homo sapiens

<400> 221
caggtgcagc tggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cctctggatt caccttcagt agctatgaca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcaatt atatcatatg atggaagtat taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agctgaggac acggctgtgt attactgtgc gagagagaat 300
gcgtgactt acgggggcta ctaccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 222

<211> 125

<212> PRT

<213> Homo sapiens

<400> 222
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Ile Ile Ser Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Asn Ala Val Thr Tyr Gly Gly Tyr Tyr His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 223
<211> 321
<212> DNA
<213> Homo sapiens

<400> 223
gacatccaga tgacccagtc tccatcctcc ctgtctacat ctgttaggaga cagagtcacc 60
atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgctt gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 224
<211> 107
<212> PRT
<213> Homo sapiens

<400> 224
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Thr Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 225
<211> 375
<212> DNA
<213> Homo sapiens

<400> 225
caggtgcagc tgggtggagtc tgggggagggc gtgggtccagc ctgggaggtc cctgagactc 60
tcctgtacaa catctggatt caccttcagt aactatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atctggatg atggaagtat taaatactat 180
gtagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
gattgtggtg gtgactgtta cagccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 226
<211> 125
<212> PRT
<213> Homo sapiens

<400> 226

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Thr Thr Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Val Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Lys Asp Cys Gly Gly Asp Cys Tyr Ser His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 227

<211> 321

<212> DNA

<213> Homo sapiens

<400> 227

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacgtatta ctgtctacag catatgagtc tcccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 228

<211> 107

<212> PRT

<213> Homo sapiens

<400> 228

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Met Ser Leu Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 229
<211> 375
<212> DNA
<213> Homo sapiens

<400> 229
caggtgcagc tgggggagtc tgggggaggc gtggccagc ctggggaggc cctgagactc 60
tcctgtacaa catctggatt caccttcagt aactatggca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atctggatg atggaagtat taaatactat 180
gtagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
gattgtggtg gtgactgtta cagccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 230
<211> 125
<212> PRT
<213> Homo sapiens

<400> 230
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Thr Thr Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Val Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Lys Asp Cys Gly Gly Asp Cys Tyr Ser His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 231
<211> 321
<212> DNA
<213> Homo sapiens

<400> 231
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcaacttgcgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcgc gcagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacgttatta ctgtctacag catatgagtc tcccgtcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 232
<211> 107
<212> PRT
<213> Homo sapiens

<400> 232

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Met Ser Leu Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 233

<211> 375

<212> DNA

<213> Homo sapiens

<400> 233

cagggtgcagc tgggtggagtc tggggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtacaa catctggatt caccttcagt aactatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atctggatg atggaagtat taaatactat 180
gtagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
gattgtggtg gtgactgtta cagccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 234

<211> 125

<212> PRT

<213> Homo sapiens

<400> 234

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Thr Thr Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Val Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Lys Asp Cys Gly Gly Asp Cys Tyr Ser His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 235
<211> 321
<212> DNA
<213> Homo sapiens

<400> 235
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcacccgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttgc caacgtatta ctgtctacag catatgagtc tcccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 236
<211> 107
<212> PRT
<213> Homo sapiens

<400> 236
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Met Ser Leu Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 237
<211> 375
<212> DNA
<213> Homo sapiens

<400> 237
caggtgcagc tggtgagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtacaa catctggatt cacccatgt aactatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggatg ggtggcagtt atctggatg atggaaagtat taaatactat 180
gtagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
gattgtggtg gtgactgtta cagccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 238
<211> 125
<212> PRT
<213> Homo sapiens

<400> 238

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Thr Thr Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Val Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Lys Asp Cys Gly Gly Asp Cys Tyr Ser His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 239

<211> 321

<212> DNA

<213> Homo sapiens

<400> 239

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcc gggcaagtca ggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacgtatta ctgtctacag catatgagtc tcccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 240

<211> 107

<212> PRT

<213> Homo sapiens

<400> 240

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Met Ser Leu Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 241

<211> 366
<212> DNA
<213> Homo sapiens

<400> 241
caggtgcagc tgggggagtc tgggggaggc gtggccagc ctggggaggtc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagc agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatg atggaagaaa taaatacaat 180
gcagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgtattacg atatttggg cggtatggac gtctgggccc aagggaccac ggtcaccgtc 360
tcctca 366

<210> 242
<211> 122
<212> PRT
<213> Homo sapiens

<400> 242
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
100 105 110
Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 243
<211> 321
<212> DNA
<213> Homo sapiens

<400> 243
gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccggggga aagagccacc 60
cttcctgca gggccagtca gagtgttacc agcaacttag cctggtagca gcagaaaacct 120
ggccaggctc ccaggctcct catctatggt gcatccacca gggccactgg tatcccagcc 180
aggttcagtg gcagtgggtc tgggacagaa ttcactctca ccatcagcag cctgccgtct 240
gaagattttg cagtttatta ctgtcagcag tatcataccct ggccattcac tttcgccct 300
gggaccaaaag tggatataaa a 321

<210> 244
<211> 107
<212> PRT
<213> Homo sapiens

<400> 244
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Thr Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Pro Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr His Thr Trp Pro Phe
85 90 95
Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
100 105

<210> 245
<211> 366
<212> DNA
<213> Homo sapiens

<400> 245
caggtgcagc tggggagtc tggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtcag cgtctggatt caccttcagc agctatggca tgcactgggt ccgcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatg atggaagaaa taaatacaat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgtattacg atatttggg cggatggac gtctgggccc aagggaccac ggtcaccgtc 360
tcctca 366

<210> 246
<211> 122
<212> PRT
<213> Homo sapiens

<400> 246
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
100 105 110
Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 247
<211> 321
<212> DNA
<213> Homo sapiens

<400> 247
gaaatagtga tgacgcagtc tccatccacc ctgtctgtgt ctccggggga aagagccacc 60
cttcctgca gggccagtc gagggttacc agcaacttag cctggtagcca gcagaaacct 120
ggccaggctc ccaggctc catctatggt gcatccacca gggccactgg tatcccagcc 180
aggttcagtg gcagtggtc tggacagaa ttcactctca ccatcagcag cctgccgtct 240
gaagattttg cagtttatta ctgtcagcag tatcatacct gccattcac tttcggccct 300
gggaccaaag tggatataa a 321

<210> 248
<211> 107
<212> PRT
<213> Homo sapiens

<400> 248
Glu Ile Val Met Thr Gln Ser Pro Ser Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Thr Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Pro Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr His Thr Trp Pro Phe
85 90 95
Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
100 105

<210> 249
<211> 366
<212> DNA
<213> Homo sapiens

<400> 249
caggtgcagc tggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacccatcagc agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggaggc ggtggcagtt atatggatg atggaaagaaa taaatacaat 180
gcagactccg tgaaggcccg attcaccatc tccagagaca attccaagaaa cacgctgaat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgttattacg atatttggg cggatggac gtctggggcc aagggaccac ggtcaccgtc 360
tcctca 366

<210> 250
<211> 122
<212> PRT
<213> Homo sapiens

<400> 250

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
 100 105 110
 Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120

<210> 251
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 251
 gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
 atcaacttgc gggcaagtca gggcattaga catgatttag gctggtatca gcagaaaacca 120
 gggaaagccc ctgagcgcct gatctatggt gcatccagtt tgcaaagtgg ggtcccatca 180
 aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
 gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
 gggaccaagg tggagatcaa a 321

<210> 252
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 252
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg His Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Arg Leu Ile
 35 40 45
 Tyr Gly Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
 85 90 95
 Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 253
 <211> 402

<212> DNA
<213> Homo sapiens

<400> 253
cagggtcagc tgggtggagtc tgggggagggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtg atatgtatg atggaaagtaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgc当地atga acagcctgag agccgaggac acggctgtgt attactgtgc gagaggtat 300
cgc当地tagtag tggctggtaact cccgcttaact ggggatacta ctattacgga 360
atggacgtct ggggccaagg gaccacggc accgtctcct ca 402

<210> 254
<211> 134
<212> PRT
<213> Homo sapiens

<400> 254
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Gly Asn Arg Val Val Val Ala Gly Thr Arg Val Thr Pro Ala
100 105 110
Asn Trp Gly Tyr Tyr Tyr Gly Met Asp Val Trp Gly Gln Gly Thr
115 120 125
Thr Val Thr Val Ser Ser
130

<210> 255
<211> 321
<212> DNA
<213> Homo sapiens

<400> 255
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcaacttgcgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagtgcct gatctatgtt gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 256
<211> 107
<212> PRT
<213> Homo sapiens

<400> 256

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Cys Leu Ile
35 40 45
Tyr Val Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 257

<211> 348

<212> DNA

<213> Homo sapiens

<400> 257

gaggtgcaac tggtgaggc tgggtacagc ctggggggc cctgagactc 60
tcctgtgcag cctctggatt caccttcagt aattatggca tgaactgggt ccggcaggct 120
ccagggaaagg ggctggagtg ggttcatac ataagtaata gtattacttc caaataactac 180
gctgactctg tgaagggccg attcaccatc tccagagaca atgccaagaa ttcactgtat 240
ctgcaaatga acagcctgag agacgtggac acggctgtgt atcaactgtgc gagaggaccg 300
ggcgggtttt actactgggg ccagggaaacc ctggtcaccg tctcctca 348

<210> 258

<211> 116

<212> PRT

<213> Homo sapiens

<400> 258

Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Asn Ser Ile Thr Ser Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Asp Val Asp Thr Ala Val Tyr His Cys
85 90 95
Ala Arg Gly Pro Gly Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val
100 105 110
Thr Val Ser Ser
115

<210> 259
<211> 321
<212> DNA
<213> Homo sapiens

<400> 259
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc cgaagtgcct gatctatgtt gcatccagtt tgcaaagtgg ggtcccatca 180
a~~g~~gttcagcg gcagtgatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgtggac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 260
<211> 107
<212> PRT
<213> Homo sapiens

<400> 260
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Cys Leu Ile
35 40 45
Tyr Val Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 261
<211> 366
<212> DNA
<213> Homo sapiens

<400> 261
gaggtgcagc tggtggagtc tgggggaggc ttggtagc cgggggggtc cctgagactc 60
tcctgtgcag cctctggatt caccttagc agctatgcca tgagctgggt cccgcaggct 120
ccagggaaagg ggctggatg ggtctcagct attagtgta gtgggtgttag cacatactac 180
gcagactccg tgaaggcccg gttcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggccgtat attactgtgc gaaagattac 300
tatgatagta gtggtatca tcctttgac tactggggcc agggaaaccct ggtcaccgtc 360
tcctca 366

<210> 262
<211> 122
<212> PRT
<213> Homo sapiens

<400> 262

Glu Val Gln Leu Leu Glu Ser Gly Gly Gly Leu Val Gln Pro Gly Gly
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Ala Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ser Ala Ile Ser Gly Ser Gly Ser Thr Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Lys Asp Tyr Tyr Asp Ser Ser Gly Tyr His Pro Phe Asp Tyr Trp
 100 105 110
 Gly Gln Gly Thr Leu Val Thr Val Ser Ser
 115 120

<210> 263
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 263
 gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
 atcaacttgcc gggcgagtca gggcatttagc aattattttag cctggtatca acagaaaacca 120
 gggaaaagttc ctaagttcct gatctatgct gcatccactt tgcaatcagg ggtcccatct 180
 cggttcagtg gcagtggatc tggacagat ttcactctca ccgtcagcag cctgcagcct 240
 gaagatgttg caacttatta ctgtcaaatg tataacagtg tcccattcac tttcgccct 300
 gggacccaaag tggatataa a 321

<210> 264
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 264
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Ser Asn Tyr
 20 25 30
 Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Val Pro Lys Phe Leu Ile
 35 40 45
 Tyr Ala Ala Ser Thr Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Val Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Val Ala Thr Tyr Tyr Cys Gln Met Tyr Asn Ser Val Pro Phe
 85 90 95
 Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
 100 105

<210> 265
 <211> 157

<212> PRT

<213> homo sapiens

<400> 265

Val	Arg	Ser	Ser	Ser	Arg	Thr	Pro	Ser	Asp	Lys	Pro	Val	Ala	His	Val
1															15
Val	Ala	Asn	Pro	Gln	Ala	Glu	Gly	Gln	Leu	Gln	Trp	Leu	Asn	Arg	Arg
															30
Ala	Asn	Ala	Leu	Leu	Ala	Asn	Gly	Val	Glu	Leu	Arg	Asp	Asn	Gln	Leu
															45
Val	Val	Pro	Ser	Glu	Gly	Leu	Tyr	Leu	Ile	Tyr	Ser	Gln	Val	Leu	Phe
															60
Lys	Gly	Gln	Gly	Cys	Pro	Ser	Thr	His	Val	Leu	Leu	Thr	His	Thr	Ile
65															80
Ser	Arg	Ile	Ala	Val	Ser	Tyr	Gln	Thr	Lys	Val	Asn	Leu	Leu	Ser	Ala
															95
Ile	Lys	Ser	Pro	Cys	Gln	Arg	Glu	Thr	Pro	Glu	Gly	Ala	Glu	Ala	Lys
															110
Pro	Trp	Tyr	Glu	Pro	Ile	Tyr	Leu	Gly	Gly	Val	Phe	Gln	Leu	Glu	Lys
															125
Gly	Asp	Arg	Leu	Ser	Ala	Glu	Ile	Asn	Arg	Pro	Asp	Tyr	Leu	Asp	Phe
130															140
Ala	Glu	Ser	Gly	Gln	Val	Tyr	Phe	Gly	Ile	Ile	Ala	Leu			
															155
															145

<210> 266

<211> 156

<212> PRT

<213> Mus musculus

<400> 266

Leu	Arg	Ser	Ser	Ser	Gln	Asn	Ser	Ser	Asp	Lys	Pro	Val	Ala	His	Val
1															15
Val	Ala	Asn	His	Gln	Val	Glu	Glu	Gln	Leu	Glu	Trp	Leu	Ser	Gln	Arg
															30
Ala	Asn	Ala	Leu	Leu	Ala	Asn	Gly	Met	Asp	Leu	Lys	Asp	Asn	Gln	Leu
															45
Val	Val	Pro	Ala	Asp	Gly	Leu	Tyr	Leu	Val	Tyr	Ser	Gln	Val	Leu	Phe
															60
Lys	Gly	Gln	Gly	Cys	Pro	Asp	Tyr	Val	Leu	Leu	Thr	His	Thr	Val	Ser
65															80
Arg	Phe	Ala	Ile	Ser	Tyr	Gln	Glu	Lys	Val	Asn	Leu	Leu	Ser	Ala	Val
															95
Lys	Ser	Pro	Cys	Pro	Lys	Asp	Thr	Pro	Glu	Gly	Ala	Glu	Leu	Lys	Pro
															110
Trp	Tyr	Glu	Pro	Ile	Tyr	Leu	Gly	Gly	Val	Phe	Gln	Leu	Glu	Lys	Gly
															125
Asp	Gln	Leu	Ser	Ala	Glu	Val	Asn	Leu	Pro	Lys	Tyr	Leu	Asp	Phe	Ala
130															140
Glu	Ser	Gly	Gln	Val	Tyr	Phe	Gly	Val	Ile	Ala	Leu				
															155
															145

<210> 267

<211> 109
<212> PRT
<213> Homo sapiens

<400> 267
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 268
<211> 108
<212> PRT
<213> Homo sapiens

<400> 268
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 269
<211> 109
<212> PRT
<213> Homo sapiens

<400> 269
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45

Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 270
<211> 109
<212> PRT
<213> Homo sapiens

<400> 270
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 271
<211> 108
<212> PRT
<213> Homo sapiens

<400> 271
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Glu
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Ser Ile Ser Ser Tyr
20 25 30
Tyr Trp Ser Trp Ile Arg Gln Pro Ala Gly Lys Gly Leu Glu Trp Ile
35 40 45
Gly Arg Ile Tyr Thr Ser Gly Ser Thr Asn Tyr Asn Pro Ser Leu Lys
50 55 60
Ser Arg Val Thr Met Ser Val Asp Thr Ser Lys Asn Gln Phe Ser Leu
65 70 75 80
Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Arg Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 272

<211> 110
<212> PRT
<213> Homo sapiens

<400> 272
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
35 40 45
Trp Ile Gly Tyr Ile Tyr Ser Gly Ser Thr Tyr Tyr Asn Pro Ser
50 55 60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
65 70 75 80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
85 90 95
Cys Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105 110

<210> 273
<211> 107
<212> PRT
<213> Homo sapiens

<400> 273
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 274
<211> 107
<212> PRT
<213> Homo sapiens

<400> 274
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45

Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp
 85 90 95
 Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 275
 <211> 114
 <212> PRT
 <213> Homo sapiens

<220>
 <221> VARIANT
 <222> 101, 102
 <223> Xaa = Any Amino Acid

<400> 275
 Asp Val Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Leu Gly
 1 5 10 15
 Gln Pro Ala Ser Ile Ser Cys Arg Ser Ser Gln Ser Leu Val Tyr Ser
 20 25 30
 Asp Gly Asn Thr Tyr Leu Asn Trp Phe Gln Gln Arg Pro Gly Gln Ser
 35 40 45
 Pro Arg Arg Leu Ile Tyr Lys Val Trp Asn Trp Asp Ser Gly Val Pro
 50 55 60
 Asp Arg Phe Ser Gly Ser Gly Thr Asp Phe Thr Leu Lys Ile
 65 70 75 80
 Ser Arg Val Glu Ala Glu Asp Val Gly Val Tyr Tyr Cys Met Gln Gly
 85 90 95
 Thr His Trp Pro Xaa Xaa Leu Thr Phe Gly Gly Thr Lys Val Glu
 100 105 110
 Ile Lys

<210> 276
 <211> 111
 <212> PRT
 <213> Homo sapiens

<400> 276
 Asp Ile Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Pro Gly
 1 5 10 15
 Glu Pro Ala Ser Ile Ser Cys Arg Ser Ser Gln Ser Leu Leu His Ser
 20 25 30
 Asn Gly Tyr Asn Tyr Leu Asp Trp Tyr Leu Gln Lys Pro Gly Gln Ser
 35 40 45
 Pro Gln Leu Leu Ile Tyr Leu Gly Ser Asn Arg Ala Ser Gly Val Pro
 50 55 60
 Asp Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Phe Thr Leu Lys Ile
 65 70 75 80

Ser Arg Val Glu Ala Glu Asp Val Gly Val Tyr Tyr Cys Met Gln Ala
85 90 95
Leu Gln Thr Trp Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105 110

<210> 277
<211> 106
<212> PRT
<213> Homo sapiens

<400> 277
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Trp Thr
85 90 95
Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 278
<211> 109
<212> PRT
<213> Homo sapiens

<400> 278
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 279
<211> 109
<212> PRT
<213> Homo sapiens

<400> 279
Glu Val Gln Leu Leu Glu Ser Gly Gly Gly Leu Val Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Ala Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Ala Ile Ser Gly Ser Gly Ser Thr Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Lys Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 280
<211> 109
<212> PRT
<213> Homo sapiens

<220>
<221> VARIANT
<222> 98
<223> Xaa = Any Amino Acid

<400> 280
Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Ser Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Ser Ile Ser Ser Ser Ser Tyr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Xaa Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 281
<211> 109
<212> PRT
<213> Homo sapiens

<400> 281
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val

35	40	45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val		
50	55	60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr		
65	70	75
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser		
100	105	

<210> 282
 <211> 108
 <212> PRT
 <213> Homo sapiens

<400> 282		
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly		
1	5	10
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn		
20	25	30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val		
35	40	45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys		
50	55	60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu		
65	70	75
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala		
85	90	95
Arg Trp Gly Gln Gly Thr Met Val Thr Val Ser Ser		
100	105	

<210> 283
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 283		
Glu Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Glu		
1	5	10
Ser Leu Lys Ile Ser Cys Lys Gly Ser Gly Tyr Ser Phe Thr Ser Tyr		
20	25	30
Trp Ile Gly Trp Val Arg Gln Met Pro Gly Lys Gly Leu Glu Trp Met		
35	40	45
Gly Ile Ile Tyr Pro Gly Asp Ser Asp Thr Arg Tyr Ser Pro Ser Phe		
50	55	60
Gln Gly Gln Val Thr Ile Ser Ala Asp Lys Ser Ile Ser Thr Ala Tyr		
65	70	75
Leu Gln Trp Ser Ser Leu Lys Ala Ser Asp Thr Ala Met Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser		
100	105	

<210> 284
<211> 109
<212> PRT
<213> Homo sapiens

<400> 284
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Ser Tyr
20 25 30
Gly Ile Ser Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Ser Ala Tyr Asn Gly Asn Thr Asn Tyr Ala Gln Lys Leu
50 55 60
Gln Gly Arg Val Thr Met Thr Asp Thr Ser Thr Ser Thr Ala Tyr
65 70 75 80
Met Glu Leu Arg Ser Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 285
<211> 109
<212> PRT
<213> Homo sapiens

<400> 285
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 286
<211> 108
<212> PRT
<213> Homo sapiens

<400> 286
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val

35	40	45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys		
50	55	60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu		
65	70	75
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala		
85	90	95
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser		
100	105	

<210> 287
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 287		
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg		
1	5	10
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr		
20	25	30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val		
35	40	45
Ala Val Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val		
50	55	60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr		
65	70	75
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser		
100	105	

<210> 288
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 288		
Gln Val Gln Leu Val Glu Ser Gly Gly Leu Val Lys Pro Gly Gly		
1	5	10
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr		
20	25	30
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val		
35	40	45
Ser Tyr Ile Ser Ser Ser Gly Ser Thr Ile Tyr Tyr Ala Asp Ser Val		
50	55	60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr		
65	70	75
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser		
100	105	

<210> 289
<211> 109
<212> PRT
<213> Homo sapiens

<400> 289
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 290
<211> 109
<212> PRT
<213> Homo sapiens

<400> 290
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Ser Tyr
20 25 30
Gly Ile Ser Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Ser Ala Tyr Asn Gly Asn Thr Asn Tyr Ala Gln Lys Leu
50 55 60
Gln Gly Arg Val Thr Met Thr Asp Thr Ser Thr Ser Thr Ala Tyr
65 70 75 80
Met Glu Leu Arg Ser Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 291
<211> 109
<212> PRT
<213> Homo sapiens

<400> 291
Glu Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Glu
1 5 10 15
Ser Leu Lys Ile Ser Cys Lys Gly Ser Gly Tyr Ser Phe Thr Ser Tyr
20 25 30
Trp Ile Gly Trp Val Arg Gln Met Pro Gly Lys Gly Leu Glu Trp Met

35	40	45
Gly Ile Ile Tyr Pro Gly Asp Ser Asp Thr Arg Tyr Ser Pro Ser Phe		
50	55	60
Gln Gly Gln Val Thr Ile Ser Ala Asp Lys Ser Ile Ser Thr Ala Tyr		
65	70	75
Leu Gln Trp Ser Ser Leu Lys Ala Ser Asp Thr Ala Met Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser		
100	105	

<210> 292
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 292		
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg		
1	5	10
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr		
20	25	30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val		
35	40	45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val		
50	55	60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr		
65	70	75
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser		
100	105	

<210> 293
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 293		
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg		
1	5	10
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr		
20	25	30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val		
35	40	45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val		
50	55	60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr		
65	70	75
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser		
100	105	

<210> 294
<211> 109
<212> PRT
<213> Homo sapiens

<400> 294
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 295
<211> 108
<212> PRT
<213> Homo sapiens

<400> 295
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Glu
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Tyr
20 25 30
Tyr Trp Ser Trp Ile Arg Gln Pro Pro Gly Lys Gly Leu Glu Trp Ile
35 40 45
Gly Tyr Ile Tyr Tyr Ser Gly Ser Thr Asn Tyr Asn Pro Ser Leu Lys
50 55 60
Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe Ser Leu
65 70 75 80
Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 296
<211> 109
<212> PRT
<213> Homo sapiens

<400> 296
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Val Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Ser Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val

35	40	45
Ser Tyr Ile Ser Ser Ser Ser Thr Ile Tyr Tyr Ala Asp Ser Val		
50	55	60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr		
65	70	75
Leu Gln Met Asn Ser Leu Arg Asp Glu Asp Thr Ala Val Tyr Tyr Cys		
85	90	95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser		
100	105	

<210> 297
 <211> 108
 <212> PRT
 <213> Homo sapiens

<400> 297			
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly			
1	5	10	15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn			
20	25	30	
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val			
35	40	45	
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys			
50	55	60	
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu			
65	70	75	80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala			
85	90	95	
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser			
100	105		

<210> 298
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 298			
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala			
1	5	10	15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Gly Tyr			
20	25	30	
Tyr Met His Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met			
35	40	45	
Gly Trp Ile Asn Pro Asn Ser Gly Gly Thr Asn Tyr Ala Gln Lys Phe			
50	55	60	
Gln Gly Arg Val Thr Met Thr Arg Asp Thr Ser Ile Ser Thr Ala Tyr			
65	70	75	80
Met Glu Leu Ser Arg Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys			
85	90	95	
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser			
100	105		

<210> 299
<211> 109
<212> PRT
<213> Homo sapiens

<400> 299
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 300
<211> 108
<212> PRT
<213> Homo sapiens

<400> 300
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 301
<211> 109
<212> PRT
<213> Homo sapiens

<400> 301
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val

35	40	45	
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val			
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr			
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys			
85	90	95	
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser			
100	105		

<210> 302
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 302			
1	5	10	15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr			
20	25	30	
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val			
35	40	45	
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val			
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr			
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys			
85	90	95	
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser			
100	105		

<210> 303
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 303			
1	5	10	15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr			
20	25	30	
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val			
35	40	45	
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val			
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr			
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys			
85	90	95	
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser			
100	105		

<210> 304
<211> 111
<212> PRT
<213> Homo sapiens

<400> 304
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 305
<211> 107
<212> PRT
<213> Homo sapiens

<400> 305
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 306
<211> 107
<212> PRT
<213> Homo sapiens

<400> 306
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Ser Asn Tyr
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Val Pro Lys Leu Leu Ile

35	40	45	
Tyr Ala Ala Ser Thr Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly			
50	55	60	
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro			
65	70	75	80
Glu Asp Val Ala Thr Tyr Tyr Cys Gln Lys Tyr Asn Ser Ala Pro Phe			
85	90	95	
Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys			
100	105		

<210> 307
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 307			
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly			
1	5	10	15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp			
20	25	30	
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile			
35	40	45	
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly			
50	55	60	
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro			
65	70	75	80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp			
85	90	95	
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys			
100	105		

<210> 308
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 308			
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly			
1	5	10	15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Ser Ile Ser Ser Tyr			
20	25	30	
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile			
35	40	45	
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly			
50	55	60	
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro			
65	70	75	80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Tyr Ser Thr Pro Ile			
85	90	95	
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys			
100	105		

<210> 309
<211> 110
<212> PRT
<213> Homo sapiens

<400> 309
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Asn Asn
20 25 30
Tyr Val Ser Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Asp Asn Asn Lys Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser
50 55 60
Gly Ser Lys Ser Gly Thr Ser Ala Thr Leu Gly Ile Thr Gly Leu Gln
65 70 75 80
Thr Gly Asp Glu Ala Asp Tyr Tyr Cys Gly Thr Trp Asp Ser Ser Leu
85 90 95
Ser Ala Gly Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 310
<211> 107
<212> PRT
<213> Homo sapiens

<400> 310
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 311
<211> 110
<212> PRT
<213> Homo sapiens

<400> 311
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Asn Asn
20 25 30
Tyr Val Ser Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu Leu

35	40	45	
Ile Tyr Asp Asn Asn Lys Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser			
50	55	60	
Gly Ser Lys Ser Gly Thr Ser Ala Thr Leu Gly Ile Thr Gly Leu Gln			
65	70	75	80
Thr Gly Asp Glu Ala Asp Tyr Tyr Cys Gly Thr Trp Asp Ser Ser Leu			
85	90	95	
Ser Ala Gly Val Phe Gly Gly Thr Lys Leu Thr Val Leu			
100	105	110	

<210> 312
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 312			
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Val Ser Ala Ser Val Gly			
1	5	10	15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Ser Ser Trp			
20	25	30	
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile			
35	40	45	
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly			
50	55	60	
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro			
65	70	75	80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ala Asn Ser Phe Pro Trp			
85	90	95	
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys			
100	105		

<210> 313
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 313			
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly			
1	5	10	15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn			
20	25	30	
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile			
35	40	45	
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly			
50	55	60	
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser			
65	70	75	80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Leu			
85	90	95	
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys			
100	105		

<210> 314
<211> 107
<212> PRT
<213> Homo sapiens

<400> 314
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Phe
85 90 95
Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
100 105

<210> 315
<211> 110
<212> PRT
<213> Homo sapiens

<400> 315
Gln Ser Val Leu Thr Gln Pro Pro Ser Ala Ser Gly Thr Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Ser Asn
20 25 30
Thr Val Asn Trp Tyr Gln Leu Pro Gly Thr Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Ser Asn Asn Gln Arg Pro Ser Gly Val Pro Asp Arg Phe Ser
50 55 60
Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Ser Gly Leu Gln
65 70 75 80
Ser Glu Asp Glu Ala Asp Tyr Tyr Cys Ala Ala Trp Asp Asp Ser Leu
85 90 95
Asn Gly Pro Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 316
<211> 108
<212> PRT
<213> Homo sapiens

<400> 316
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr

35	40	45	
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser			
50	55	60	
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu			
65	70	75	80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His			
85	90	95	
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu			
100	105		

<210> 317
 <211> 108
 <212> PRT
 <213> Homo sapiens

<400> 317			
Ser Tyr Glu Leu Thr Gln Pro Pro Ser Val Ser Val Ser Pro Gly Gln			
1	5	10	15
Thr Ala Arg Ile Thr Cys Ser Gly Asp Ala Leu Pro Lys Lys Tyr Ala			
20	25	30	
Tyr Trp Tyr Gln Gln Lys Ser Gly Gln Ala Pro Val Leu Val Ile Tyr			
35	40	45	
Glu Asp Ser Lys Arg Pro Ser Gly Ile Pro Glu Arg Phe Ser Gly Ser			
50	55	60	
Ser Ser Gly Thr Met Ala Thr Leu Thr Ile Ser Gly Ala Gln Val Glu			
65	70	75	80
Asp Glu Ala Asp Tyr Tyr Cys Tyr Ser Thr Asp Ser Ser Gly Asn His			
85	90	95	
Val Val Phe Gly Gly Thr Lys Leu Thr Val Leu			
100	105		

<210> 318
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 318			
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly			
1	5	10	15
Asp Arg Val Thr Ile Thr Cys Gln Ala Ser Gln Asp Ile Ser Asn Tyr			
20	25	30	
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile			
35	40	45	
Tyr Asp Ala Ser Asn Leu Glu Thr Gly Val Pro Ser Arg Phe Ser Gly			
50	55	60	
Ser Gly Ser Gly Thr Asp Phe Thr Phe Thr Ile Ser Ser Leu Gln Pro			
65	70	75	80
Glu Asp Ile Ala Thr Tyr Tyr Cys Gln Gln Tyr Asp Asn Leu Pro Ile			
85	90	95	
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys			
100	105		

<210> 319
<211> 108
<212> PRT
<213> Homo sapiens

<400> 319
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Val Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 320
<211> 111
<212> PRT
<213> Homo sapiens

<400> 320
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 321
<211> 5
<212> PRT
<213> Homo sapiens

<400> 321
Ser Tyr Asp Met His
1 5

<210> 322

<211> 17
<212> PRT
<213> Homo sapiens

<400> 322
Val Ile Trp Ser Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val Lys
1 5 10 15
Gly

<210> 323
<211> 16
<212> PRT
<213> Homo sapiens

<400> 323
Glu Val Glu Ser Ala Met Gly Gly Phe Tyr Tyr Asn Gly Met Asp Val
1 5 10 15

<210> 324
<211> 11
<212> PRT
<213> Homo sapiens

<400> 324
Arg Ala Ser Gln Gly Ile Arg Ile Asp Leu Gly
1 5 10

<210> 325
<211> 7
<212> PRT
<213> Homo sapiens

<400> 325
Ala Ala Ser Thr Leu Gln Ser
1 5

<210> 326
<211> 9
<212> PRT
<213> Homo sapiens

<400> 326
Leu Gln His Lys Ser Tyr Pro Leu Thr
1 5

<210> 327
<211> 5
<212> PRT
<213> Homo sapiens

<400> 327
Arg Asn Tyr Met Ser
1 5

<210> 328
<211> 16
<212> PRT
<213> Homo sapiens

<400> 328
Val Ile Tyr Ser Gly Asp Arg Thr Tyr Tyr Ala Asp Ser Val Lys Gly
1 5 10 15

<210> 329
<211> 7
<212> PRT
<213> Homo sapiens

<400> 329
Gly Glu Gly Gly Phe Asp Tyr
1 5

<210> 330
<211> 11
<212> PRT
<213> Homo sapiens

<400> 330
Arg Ala Ser Gln Ser Val Ser Ser Asn Leu Ala
1 5 10

<210> 331
<211> 7
<212> PRT
<213> Homo sapiens

<400> 331
Gly Ala Ser Ile Arg Ala Thr
1 5

<210> 332
<211> 8
<212> PRT
<213> Homo sapiens

<400> 332
Gln Gln Tyr Asn Tyr Trp Trp Thr
1 5